Maricopa County COVID-19 Impact Community Health Needs Assessment:
Community Survey Report

September 2021

Report prepared by:

Lilliana Cardenas
Jackie Ward
Cassie Leitch
Hamza Rafique
Tiffany Tu
Annie Daymude
Lia Koski
Adriana Holmes

Maricopa County Public Health
WeArePublicHealth.org

Table of Contents

Foreword

COVID-19 has impacted all residents of Maricopa County, some more than others. Beyond its toll on physical health, the pandemic has weighed heavily on those who have experienced its rippling effects of economic hardship, social isolation, and mental health issues. It was with this in mind that our department mobilized to collect data that would not only inform our pandemic response, but also find a path towards recovery. The COVID-19 Impact Community Health Needs Assessment (CHNA) Survey was conducted to better understand the most pressing needs facing our residents due to the pandemic, including the social and economic consequences. Existing disparities in communities of color and other marginalized populations have been exacerbated by COVID-19, making survival and recovery much more difficult for far too many in our community. The COVID-19 Impact CHNA survey was successfully implemented from May 2021 – July 2021, some key county level findings were:

48% of respondents reported that mental health issues have had the greatest impact on their community.

30% of respondents reported that lack of people immunized to prevent disease has had the greatest impact on their community.

47% of respondents reported that access to COVID-19 vaccine events has been the greatest strength of their community.

Almost **1 in 4** respondents rated their current **physical health** as **worse** compared to their physical health <u>prior</u> to March of 2020.

Almost **2 in 5** respondents rated their current **mental health** as **worse** compared to their mental health <u>prior</u> to March of 2020.

MCDPH is committed to putting Health Equity and addressing Health Disparities on our road to build a healthier Maricopa County. This report along with our COVID-19 Impact Focus Groups will provide the foundation for the strategic direction of how federal recovery dollars will be allocated and used to build infrastructure and expand supports within public health and community organizations. Findings from this survey will be used to help ensure community informed assessments and data collection efforts, mobilize for equitable and accessible decision making, and collaborate in the creation of community led solutions. Results will inform the direct allocation of resources and funding to community organizations and municipalities to address priority areas in their communities.

In addition to this community survey report, additional analysis will be conducted on qualitative data collected via the survey and shared over the following months along with the COVID-19 Impact Focus Group report done in collaboration with Arizona State University Southwestern Interdisciplinary Research Center (ASU SIRC) and the Arizona Community Engagement Alliance (AZ CEAL). All together they will help shape the Community Health Improvement Plan and influence resource allocation over the next two to three years. We hope that this community survey report will provide insight to the needs and strengths of our community during this difficult time and provide our partners with data and tools to leverage resources and inform decision making to improve health outcomes in Maricopa County.

To learn more about the Maricopa County CHNA process, previous data collection efforts and reports, please visit www.maricopahealthmatters.org. You can find the full regional and city profiles can be found: https://www.maricopa.gov/5614/Regional-Profiles.

Sincerely,

Marcy Flanagan, DBA, MPH, MA
Director, Maricopa County Department of Public Health

Acknowledgements

Accomplishing work of this magnitude can only be achieved through a collaborative effort involving groups and individuals too numerous to name. Here the MCDPH team recognizes many of our effort's key supporters and contributors. Still, the MCDPH team also wishes to thank the many others whose participation and assistance enriched the process and made this final product possible.

The Synapse Coalition informed the development and strategy of the COVID-19 Impact Community Health Assessment (CHA) survey, and the Health Improvement Partnership of Maricopa County (HIPMC) leveraged its connections and ensured it reached all corners of our community.

The **Synapse Coalition** is a collaborative effort between the Maricopa County Department of Public Health (MCDPH), four major non-profit hospital systems, 3 Federally Qualified Healthcare Centers (FQHC), and a community health foundation. They work together to mobilize community data collection efforts that inform investments and resource allocation to address community health needs through their commitment and investment. Members of the 2021 partnership include (Banner Health, Dignity Health, Mayo Clinic, Native Health, Neighborhood Outreach Access to Health (NOAH), Phoenix Children's, Valleywise Health, and Vitalyst Health Foundation).

The **Health Improvement Partnership of Maricopa County (HIPMC)** is a partnership between MCDPH and more than 100 public and private organizations who are united by a shared vision of health equity, community empowerment, collaboration, and access to care for all. Please refer to the overall Maricopa County Community Health Assessment (CHA) 3.0 report or visit Maricopa Health Matters for the full list of organizations.

Survey Overview

COVID-19 Impact Community Health Needs Assessment: Community Survey

Overview

COVID-19 was declared a global pandemic in March of 2020, and this set off a series of drastic changes to everyday life for residents of Maricopa County. From illness, job loss, school closures, mask mandates, and death, life as the community knew it would not be the same for most over the next 18 months. As the pandemic and response evolved, it was clear that recovery efforts would require more than time and money. In May of 2021, MCDPH mobilized data collection resources and community partnerships to explore how COVID-19 had impacted residents and determine how Public Health could play an active role in community recovery efforts. As the community began to resume a new normal following the pandemic's height, MCDPH sought ways to support the community better and launched the COVID-19 Community Impact Survey. MCDPH also partnered with an extensive network of community-based organizations and healthcare partners to collect community surveys from residents and professionals within Maricopa County. This COVID-focused survey is part of the Coordinated Maricopa County Community Health Needs Assessment (CHNA) designed to identify priority health issues, resources, and barriers to care. This supplemental COVID-19 Impact Survey will help guide future community health improvement planning and funding efforts over the next two years to assist in the recovery of the pandemic. The survey data will inform the distribution of grants throughout the county to local governments and community-based organizations to support our communities and address priority areas.

Survey questions were grouped into the following sections: Demographics, Physical and Mental Health, Health Care and Living Expenses, COVID-19 Impact on Employment, Barriers, Strengths, Health Conditions, Community Issues, Survey Usability, and Other Noteworthy COVID-19 Experiences. In this report, all questions were broken out by their respective race/ethnicity and age groups. Due to insufficient data collected for the special population groups, these individual breakouts will be limited and not presented for all survey questions in this report. For more information regarding the special population breakouts, please submit a data request. This report details the results of all surveys collected between May 2021 and July 2021.

Methods and Sample

The survey provides information about how COVID-19 has impacted prominent health problems and overall quality of life for communities in Maricopa County. The information gathered is critical in supporting prevention efforts, intervention planning, and needs assessments at the local level. The topics addressed in this section include the survey questionnaire, its administration, and participant demographics.

Questionnaire

The foundation for this survey questionnaire was developed by the National Association of County and City Health Officials (NACCHO). The survey was modified from its original version by members of the Synapse Coalition, a group of non-profit hospitals and federally qualified health care providers, the Health Improvement Partnership of Maricopa County (HIPMC), and MCDPH staff. Additional questions and response options were added and modified from the original format to assess the impact of COVID-19 on Maricopa County residents and explore additional health issues and social determinants of health.

The COVID-19 Impact Community Survey included 27 questions that ranged from demographics, perspectives on quality of life, and essential issues and behaviors impacting the health of the individual and community. Please see Appendix C for the complete version of the survey.

The questionnaire was primarily provided on a digital platform using Alchemer© and publicized on the Maricopa Health Matters website (http://www.maricopahealthmatters.org), and a paper format was available upon request. Surveys were provided in over 12 languages (Arabic, Burmese, Chinese, English, French, Kinyarwanda, Korean, Lao, Spanish, Swahili, Tagalog, Thai, and Vietnamese). MCDPH partnered with many diverse local community-based organizations to help provide survey translation to capture the needs of the community most accurately and better serve them. To maximize resources, the COVID-19 CHNA survey was distributed via extensive community partner networks throughout Maricopa County, hospital/healthcare systems, municipalities, school districts, social media, and MCDPH internal programs. maximize resources.

Recruitment

The goal for the community survey was 15,000 responses. The survey was widely publicized with community and healthcare partners before the survey launched to secure presence at community events and promote online outreach. Survey distribution was particularly successful at COVID-19 vaccination events throughout the 15-minute observation period post-vaccination. A QR code was developed, and participants had the option to complete the survey on their personal phone or on an iPad provided by the MCDPH team. MCDPH also developed an internal email template about the COVID-19 Impact Community Survey for staff to distribute to their networks and partners to encourage them to take part in this large effort. On the Maricopa Health Matters website, MCDPH highlighted the importance of sharing the survey with co-workers, friends, family, and neighbors to create awareness for the survey. A COVID-19 Survey Communication Toolkit was also developed to include graphics, flyers, social media sample post templates, and PowerPoint presentations that could be utilized to help promote the survey.

The MCDPH team wanted to ensure diverse community representation and that the survey provided insight from all regions (Northeast, Northwest, Central, Southeast, Southwest) of the county. MCDPH collaborated with several community-based organizations to provide stipends from $2,000 - $5,000 to support survey translation, distribution & completion, social media outreach via networks, purchase of incentives for survey completion, and administrative expenses. These organizations (Antioch Church – Peoria, Arizona Chapter of Black Nurses Association, Arizona Chinese Chamber of Commerce, Arizona Korean Nurses Association, Arizona Lao Association, Circle the City, Facilitating Independence Building Opportunities, Peer Solutions, Thai American Association of Arizona, and Unlimited Potential) were identified for their work in the COVID-19 response and in representing specific underserved populations. MCDPH volunteers and ASU students were available to support survey dissemination at community events. Promotional incentives such as travel size first aid kits, cloth masks, and mini hand sanitizer bottles were distributed at community events for individuals who completed the survey. MCDPH monitored all survey entries and outreach efforts on a weekly basis to collect real-time data on population representation. A weekly data report was generated to identify population underrepresentation of specific groups by zip code, age, race/ethnicity, and special population. This gap analysis led to focused outreach efforts with community partners specifically serving any underrepresented groups.

Race Stratification

Participants were asked to specify all the race(s)/ethnicities they identified with. The question allowed survey participants to select the following races: African American/Black, American Indian/Native American, Asian, Hispanic/Latinx, Native Hawaiian or other Pacific Islander, Caucasian/White, prefer not to answer or Other. Survey participants who selected "Other" could specify the race/ethnicity they identified with through a write-in option. Due to the way the survey question was asked, the MCDPH team was unable to identify the race/ethnicity that the survey respondent primarily identified with if more than one was selected. The MCDPH team acknowledged this as a limitation and will strive to incorporate a different structure to allow for a more accurate and inclusive collection of race and ethnicity data in future survey design. Given the way that the survey question was created to collect race/ethnicity, the MCDPH team took the following approach to analyze the data.

Only one race selected: If a survey respondent selected only one race, they were categorized into that particular race category.

Two races selected: There were a couple of strategies applied if a survey respondent selected two races. The first strategy was to identify survey respondents who selected Caucasian/White as one of the two races. In these cases, the non-Caucasian/White race was the category that the survey respondent would be categorized into. If neither of the two races selected were Caucasian/White, then the survey respondent was moved into the category 'Two or more races'.

More than two races selected: The survey respondents who selected more than two races were moved into the category 'Two or more races'.

No races selected but a race/ethnicity written into 'Other': Those survey respondents who did not select any racial or ethnic group but wrote a comment into 'Other' were each reviewed carefully to determine if there was a category that the MCDPH team could identify and place the respondent into. For example, if someone wrote in 'Latino', the MCDPH team placed them into the 'Hispanic/Latinx' category. There were responses that included regions or nationalities, and the MCDPH team also placed them into specific categories if it seemed appropriate. For example: MCDPH received responses like 'Korean', 'Asian/White' or 'from India' so these responses were

placed into the Asian category. Some regions were too large and diverse to make any assumptions, so the MCDPH team placed them into the 'Unknown' category. Examples of cases like these were 'American', 'European', 'Middle Eastern' or 'Mediterranean'.

The final analyses grouped individuals into the final categories:

- African American/Black
- American Indian/Native American
- Asian
- Caucasian/White
- Hispanic/Latinx

- Native Hawaiian or other Pacific Islander
- Two or more races
- Unknown (this category included those that the MCDPH couldn't assess enough information from the write-in option or those who selected 'Prefer not to answer')

In addition to the categorization of each survey respondent into one of the following groups listed above, another indicator was created to identify those as 'multi-racial'. Many participants were identified through the 'Other' comment in which they chose to write in 'bi-racial', 'mixed race', or something similar as opposed to selecting any of the other categories. The MCDPH team also identified multi-racial individuals by those who selected more than one race, regardless of the specific combination. Results also combined Asian, Native Hawaiian or other Pacific Islander into a 'Asian, Native Hawaiian, or other Pacific Islander' group due to lower response rates from those populations.

Gender Stratification

The survey allowed respondents to select one of five different categories: Female, Male, Transgender, prefer not to answer and Prefer to self-describe. The selection 'Prefer to self-describe' allowed respondent to write in their gender. The information contained in the 'Prefer to self-describe' option was analyzed to determine if the MCDPH team could create more breakouts. For those survey respondents who indicated either Male or Female and then selected Transgender, the response was then marked as Transgender. Unfortunately, the number of individuals who selected Transgender and/or wrote in a gender was too small to do individual breakouts so each of these survey respondents were categorized into a group named 'Additional Genders'. Ultimately, the final four categories created were the following: Woman, Man, Additional Genders and Unknown. The Unknown category contained all those respondents

that left this question blank (but answered the rest of the survey) or those that selected they preferred not to answer. Male and Female were replaced with Man and Woman to represent gender since Male and Female are the labels for sex.

Limitations to Gender Stratification

The MCDPH team would like to acknowledge that the gender question was not asked appropriately. The question 'What is your gender' provided two options of sex: female and male, as well as the option transgender – which is not considered a gender. During the first couple weeks when the survey went live, survey respondents were able to select multiple genders, which would have been more appropriate for an individual who wanted to select their gender and identify as transgender. Due to the perceived complexity at the time that this would have added to the analysis, the survey instrument was modified to only allow respondents to select just one gender. Unfortunately, this limited respondents from describing their gender more satisfactorily. While this survey instrument had its flaws, the collected data was analyzed with feedback from subject matter experts to proceed with as much sensitivity and accuracy as possible. Many discussions were held to determine how to best represent the lived experiences and identities of survey respondents while also honor the principles of statistics and protect respondents' answers from potentially being identifiable. The consensus was to create the final categories for gender: 'Woman', 'Man', 'Additional Genders', and 'Unknown.' In the future, MCDPH's surveys such as this COVID-19 Impact Community Survey, will incorporate a much more accurate and inclusive question regarding gender. The goal is to ask about gender in a manner that invites survey respondents to state their gender and allow MCDPH to better understand the unique experiences and needs of each of the gender populations, particularly the minority genders.

MCDPH is committed to standardizing and improving the methods in which demographic information such as race and gender are collected and analyzed moving forward.

Qualitative Data Analysis Methodology

Free response questions were analyzed through a thematic analysis. A codebook was developed inductively based on the response data, and key themes were identified with the consensus of the epidemiology team. At least 50% of the collected responses from each region in Maricopa County were analyzed and coded with key themes, totaling 2,186 responses analyzed. Key themes were ranked by frequency. Descriptions were also provided of the key themes to represent the breadth of information the responses included. Exemplar quotes were supplied for each theme to give more examples of the responses provided.

Participants

The final sample after the survey closed on July 9, 2021, contained a total of 14,380 surveys completed by residents of Maricopa County. The summary of participants below provides the demographic breakdown of responses received from community residents. Please note that not all respondents provided their demographic information and not all participants answered every question.

Summary of Participants

Over **3 in 5** survey participants identified as **Caucasian/White**.

African American/Black 4%

Unknown/
Not Given 5%

Native Hawaiian/
other Pacific
Islander 1%

| Caucasian/White 64% | Hispanic/Latinx 18% | | | | | | |

Two or more races 1%

Asian 5%

American Indian/Native American 1%
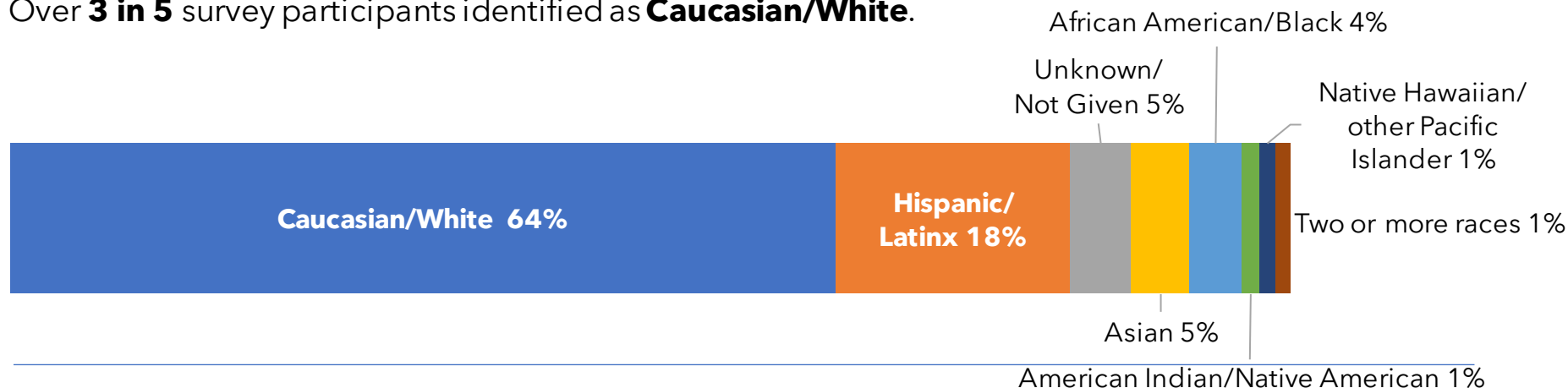
The **majority** of survey participants were **women**.

Women	- - - - - -	**69%**
Men	- - - - - -	**29%**
Additional Genders	- - - - - -	**1%**
Unknown	- - - - - -	**1%**
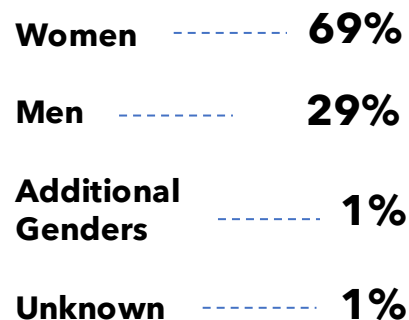
Over **2 in 5** survey participants were between ages **45-64 years**.

6%	31%	43%	20%
12-24	25-44	45-64	65+
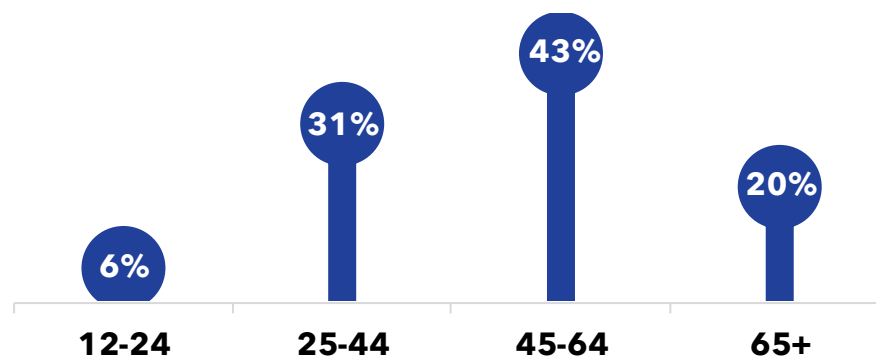
Almost **1 in 3** survey participants identified as an **adult with children under age 18 or living in the same home**.

Adult with children <18 or living in same home	34.2%
Single parent	7.7%
Person living with a disability	7.0%
Veteran	6.0%
LGBTQI	5.2%
Immigrant	3.3%
Refugee	0.5%
Person experiencing homelessness	0.4%
Person living with HIV/AIDS	0.4%
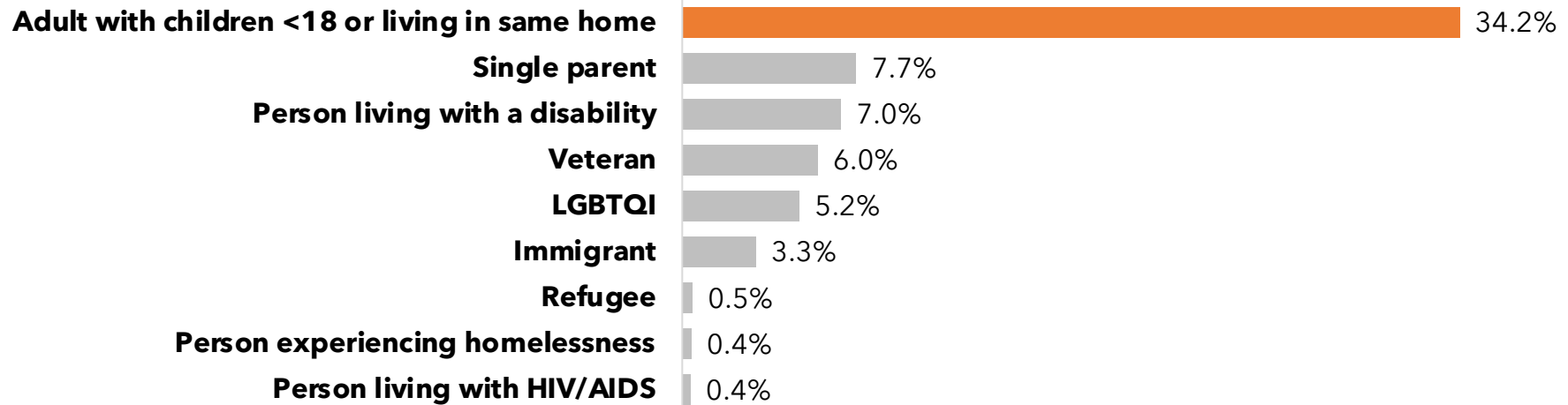
Maricopa County Survey Results

Maricopa County residents were asked questions related to their perception of their own physical and mental health. Participants were asked to rate the current state of their mental and physical health (since March 2020) and to describe how their current physical/mental health compared to pre-March 2020. Mental and physical health are fundamentally linked and significantly impact an individual's quality of life, demands on health care, and other publicly funded services. The relationship between mental and physical health is especially significant for chronic conditions. Social determinants of health (SDOH) impact both chronic physical conditions and mental health. Key aspects of prevention include increasing physical activity, improving access to affordable nutritious foods, ensuring adequate income, and fostering social inclusion and social support. These preventative measures help reduce risk factors related to physical and mental health.[1] This section summarizes the results of survey questions related to physical health and mental health.

Physical Health

Participants were asked: **"Since March of 2020 (the start of the COVID-19 pandemic), how would you rate your physical health?"** Most survey participants rated their physical health as *'Excellent or Very Good'* (Figure 1).

Physical Health Rating Since March of 2020

Excellent or Very Good	Good	Fair or Poor
48.1%	32.8%	19.1%

Figure 1

Race/Ethnicity

Physical Health Rating Since March of 2020

	Excellent or Very Good	Good	Fair or Poor
African American/Black	44.9%	35.9%	19.2%
American Indian/Native American	39.2%	33.3%	27.5%
Asian/Native Hawaiian/Pacific Islander	47.9%	36.4%	15.7%
Caucasian/White	50.9%	31.7%	17.4%
Hispanic/Latinx	37.9%	37.0%	25.2%
Two or more races	44.4%	28.4%	27.2%
Unknown/Not Given	56.1%	26.7%	17.2%

Figure 2

Age

Physical Health Rating Since March of 2020

Age	12-17	18-24	25-34	35-44	45-54	55-64	65-74	75+
Fair or Poor	20.0%	22.0%	24.2%	20.4%	17.4%	16.8%	18.5%	18.2%
Good	29.9%	34.9%	34.3%	33.5%	35.1%	32.4%	28.7%	30.1%
Excellent or Very Good	50.1%	43.1%	41.5%	46.1%	47.5%	50.8%	52.9%	51.7%

Legend: ■ Excellent or Very Good ■ Good ■ Fair or Poor
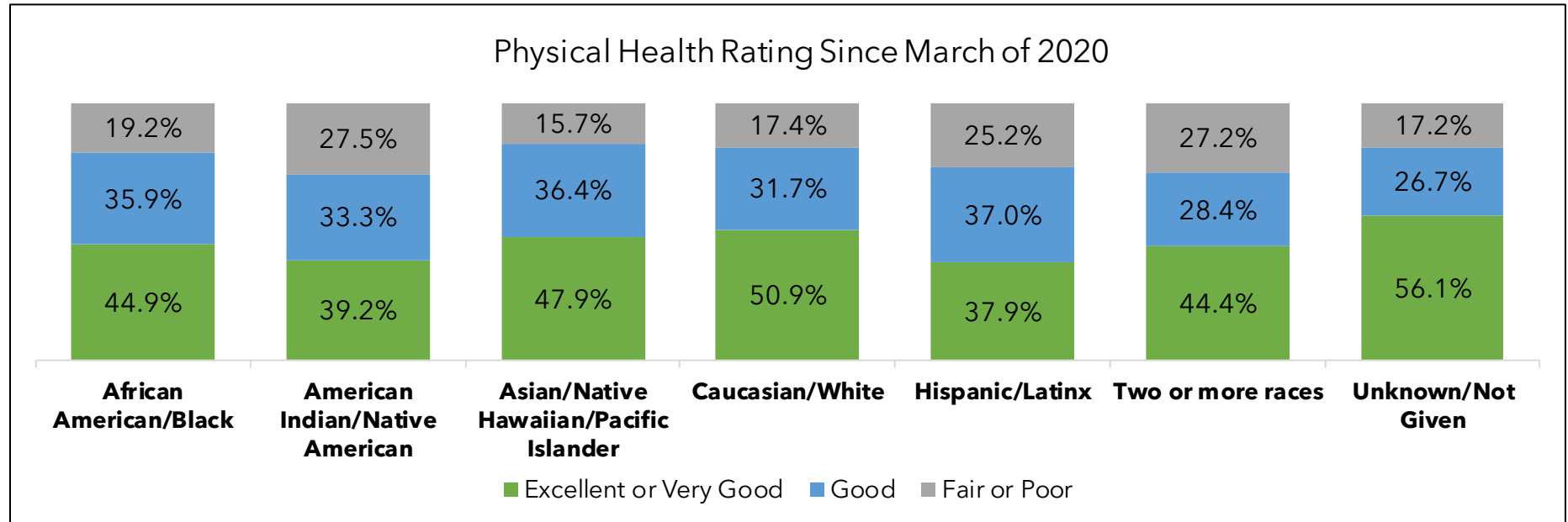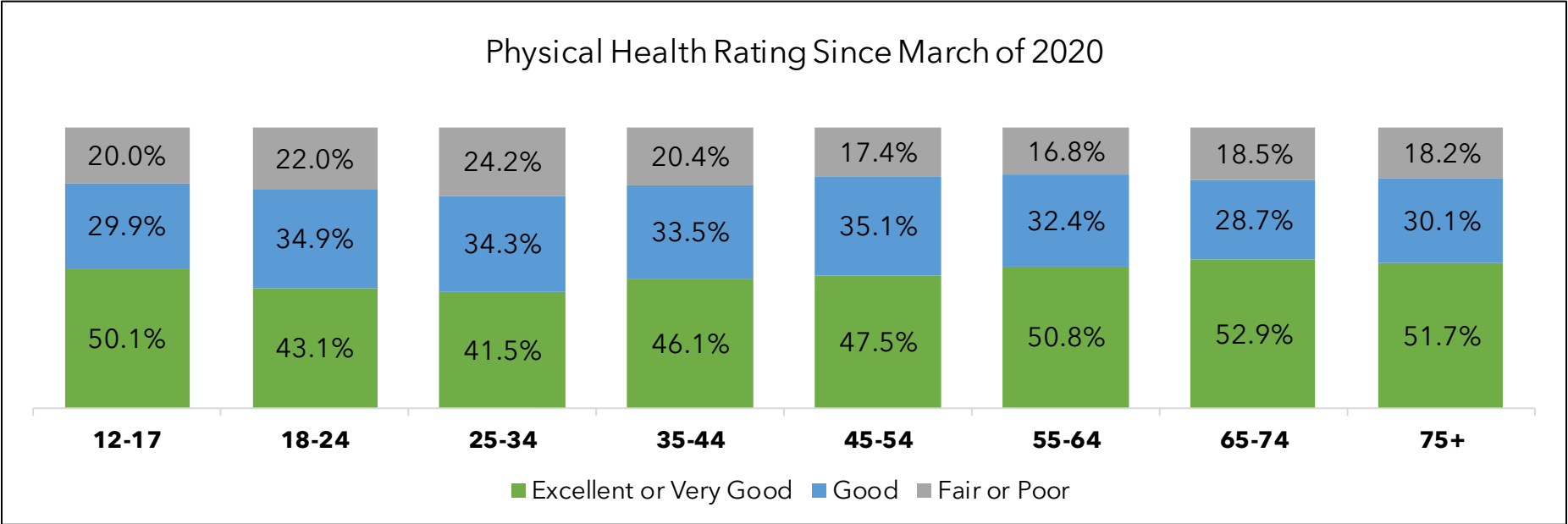
Figure 3

Participants were asked: "**Would you rate your current physical health as Better, Similar, or Worse compared to your physical health prior to March of 2020?**" Most survey participants rated their current physical health as *'Similar'* (Figure 4).
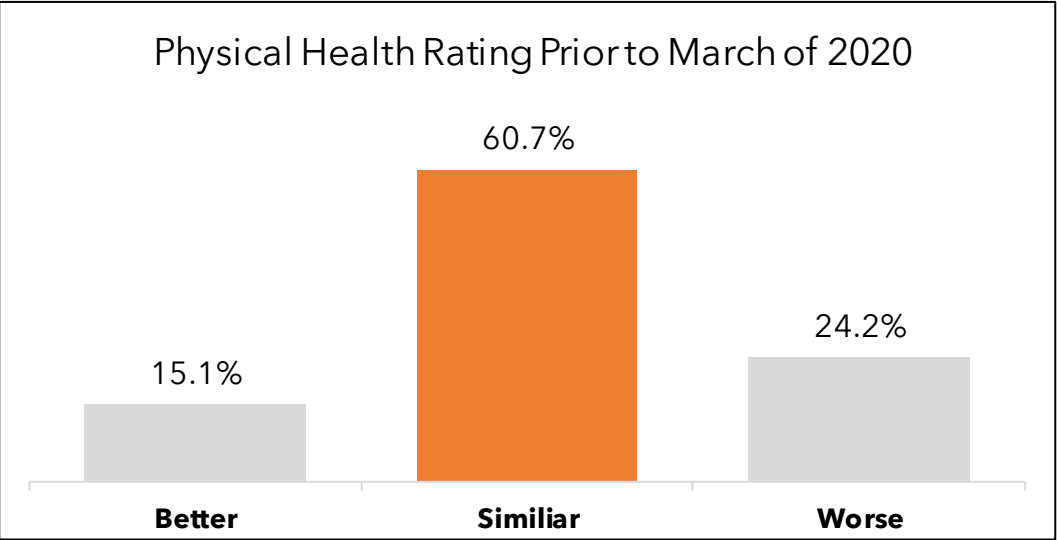
Physical Health Rating Prior to March of 2020

- Better: 15.1%
- Similiar: 60.7%
- Worse: 24.2%

Figure 4

Race/Ethnicity

Physical Health Rating Prior to March of 2020

	African American/Black	American Indian/Native American	Asian/Native Hawaiian/Pacific Islander	Caucasian/White	Hispanic/Latinx	Two or more races	Unknown/Not Given
Worse	21.1%	32.8%	15.1%	25.1%	23.8%	37.5%	22.8%
Similar	61.2%	43.1%	63.8%	61.9%	57.3%	46.4%	61.8%
Better	17.7%	24.0%	21.2%	13.0%	18.9%	16.1%	15.4%

■ Better ■ Similar ■ Worse

Figure 5

Age

Physical Health Rating Prior to March of 2020

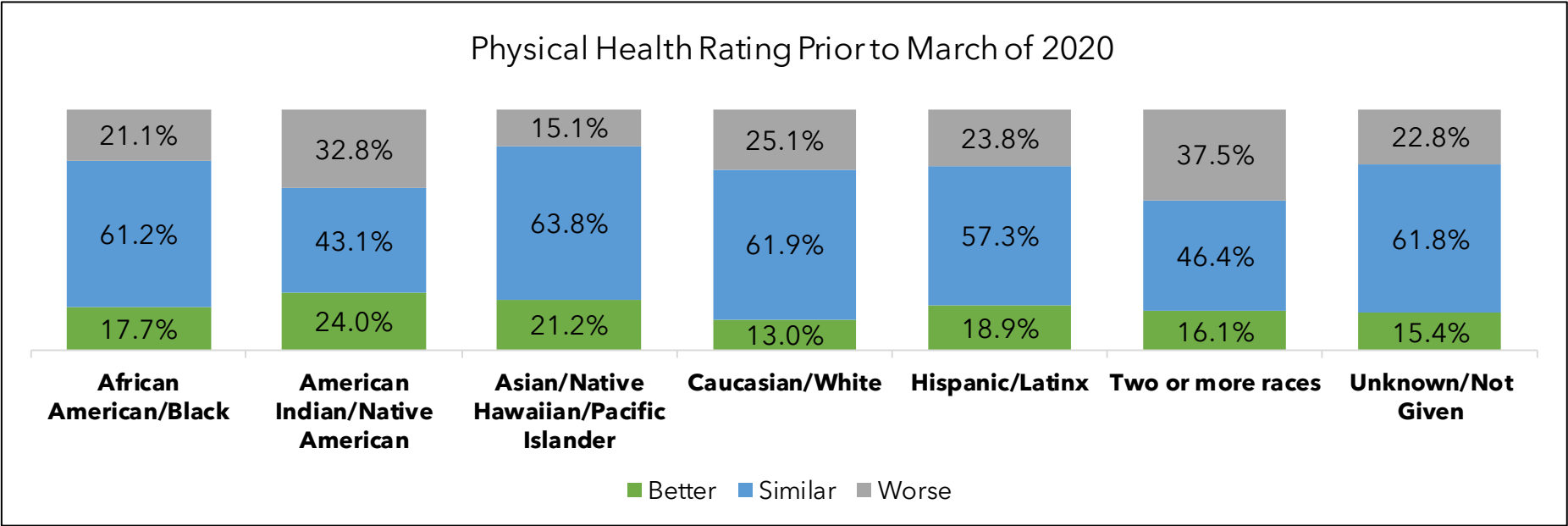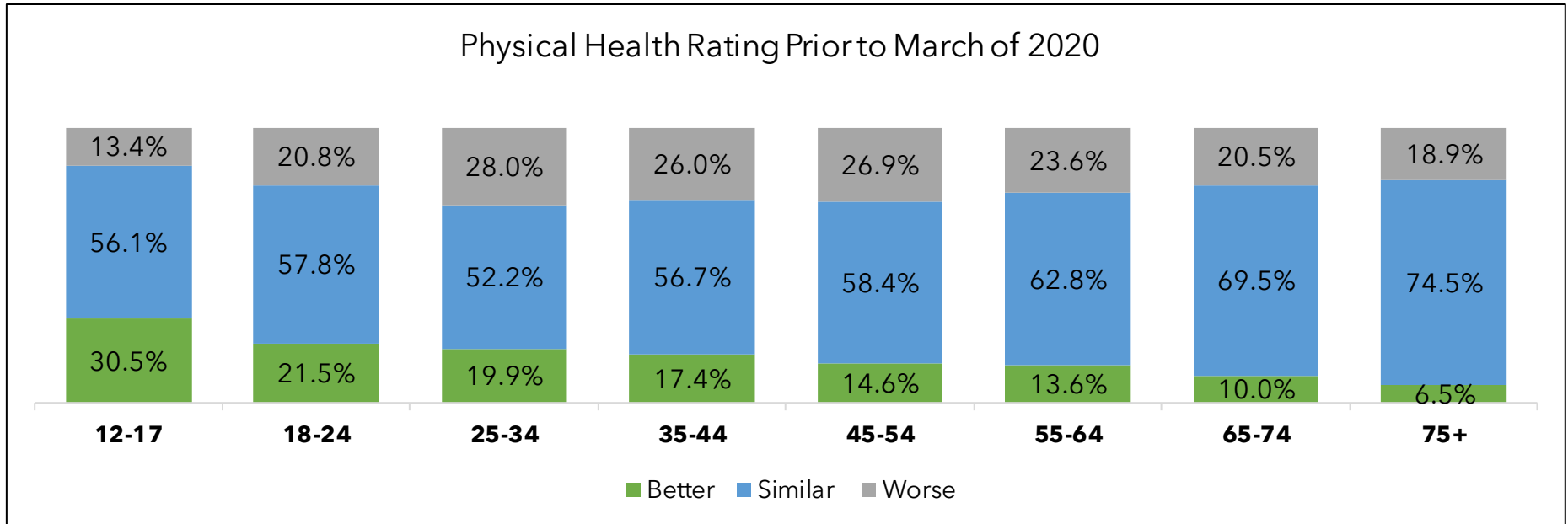| Age	Better	Similar	Worse
12-17	30.5%	56.1%	13.4%
18-24	21.5%	57.8%	20.8%
25-34	19.9%	52.2%	28.0%
35-44	17.4%	56.7%	26.0%
45-54	14.6%	58.4%	26.9%
55-64	13.6%	62.8%	23.6%
65-74	10.0%	69.5%	20.5%
75+	6.5%	74.5%	18.9%

■ Better ■ Similar ■ Worse

Figure 6

Mental Health

Participants were asked: "**Since March of 2020 (the start of the COVID-19 pandemic), how would you rate your mental health, including your mood, stress level, and your ability to think?**" Most survey participants rated their mental health as *'Fair or Poor'* (Figure 7).
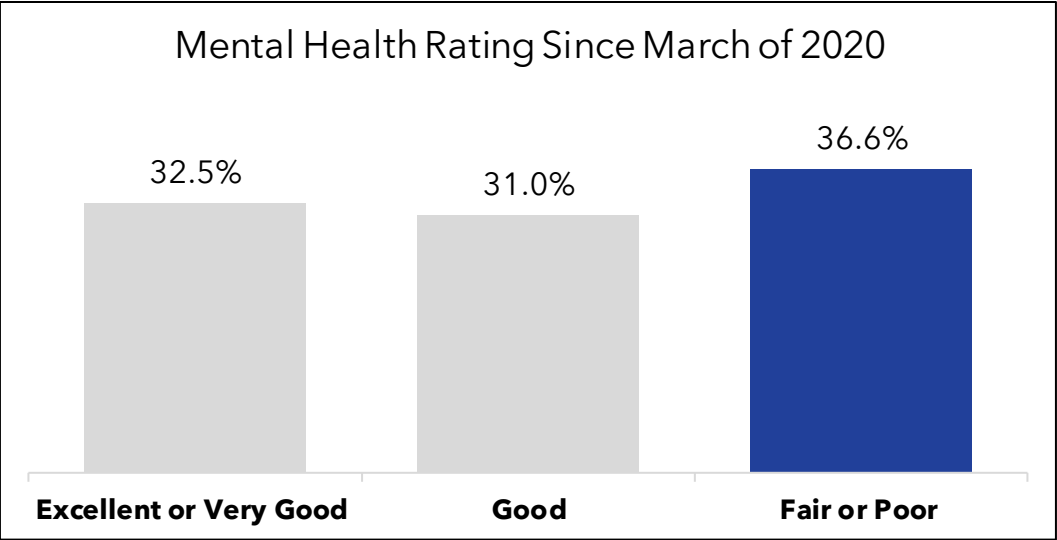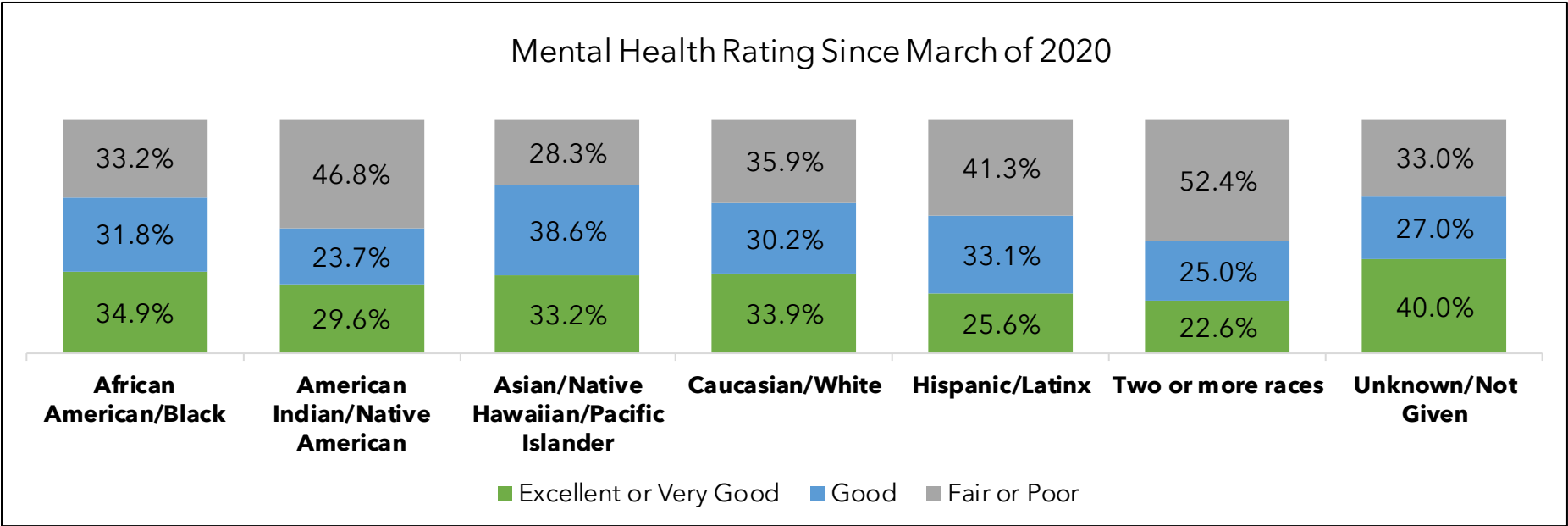
Mental Health Rating Since March of 2020

Excellent or Very Good	Good	Fair or Poor
32.5%	31.0%	36.6%

Figure 7

Race/Ethnicity

Mental Health Rating Since March of 2020

	African American/Black	American Indian/Native American	Asian/Native Hawaiian/Pacific Islander	Caucasian/White	Hispanic/Latinx	Two or more races	Unknown/Not Given
Fair or Poor	33.2%	46.8%	28.3%	35.9%	41.3%	52.4%	33.0%
Good	31.8%	23.7%	38.6%	30.2%	33.1%	25.0%	27.0%
Excellent or Very Good	34.9%	29.6%	33.2%	33.9%	25.6%	22.6%	40.0%

■ Excellent or Very Good ■ Good ■ Fair or Poor

Figure 8

Age

Mental Health Rating Since March of 2020

Age	Excellent or Very Good	Good	Fair or Poor
12-17	29.5%	25.0%	45.5%
18-24	15.9%	27.7%	56.4%
25-34	21.2%	28.9%	50.0%
35-44	25.5%	30.3%	44.3%
45-54	29.6%	33.9%	36.5%
55-64	39.4%	31.5%	29.1%
65-74	43.1%	31.8%	25.1%
75+	50.7%	27.5%	21.8%

Figure 9

Participants were asked: "**Would you rate your current mental health as Better, Similar, or Worse compared to your mental health prior to March of 2020?**" Most survey participants rated their current mental health as *'Similar'* (Figure 10).
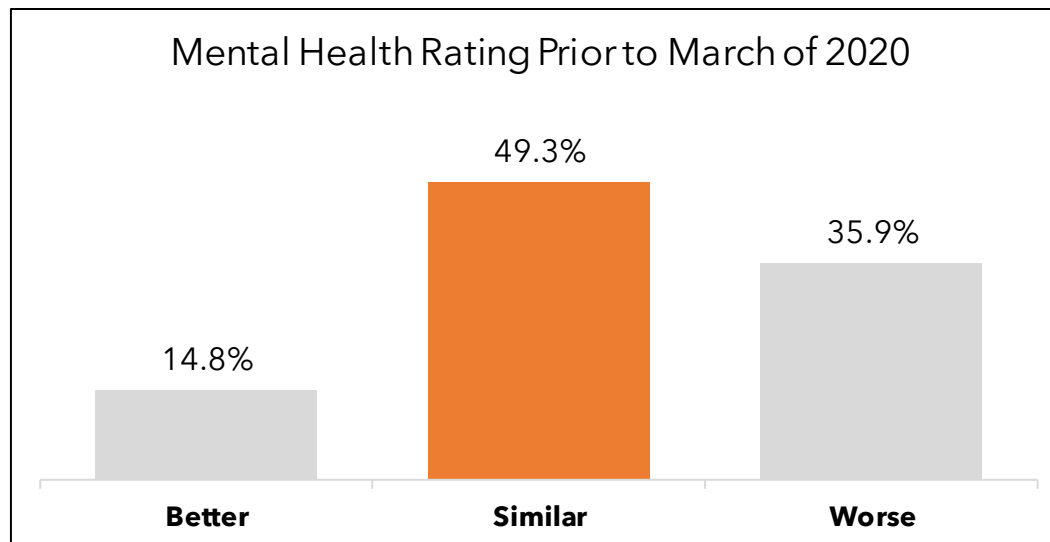
Mental Health Rating Prior to March of 2020
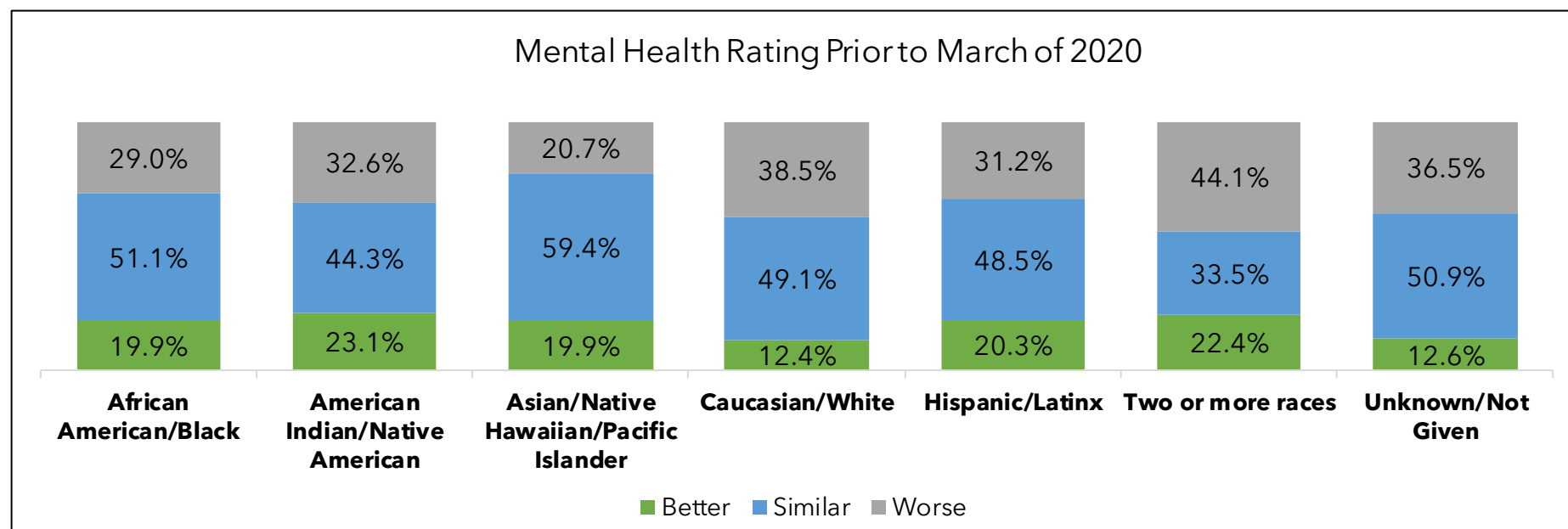

Figure 10

Race/Ethnicity

Mental Health Rating Prior to March of 2020

Figure 11

Age

Mental Health Rating Prior to March of 2020

Age	Better	Similar	Worse
12-17	25.5%	46.8%	27.7%
18-24	19.4%	41.4%	39.3%
25-34	17.7%	38.8%	43.5%
35-44	16.4%	41.7%	41.9%
45-54	15.2%	46.0%	38.9%
55-64	13.3%	54.5%	32.3%
65-74	11.8%	62.0%	26.2%
75+	8.9%	68.9%	22.2%

■ Better ■ Similar ■ Worse
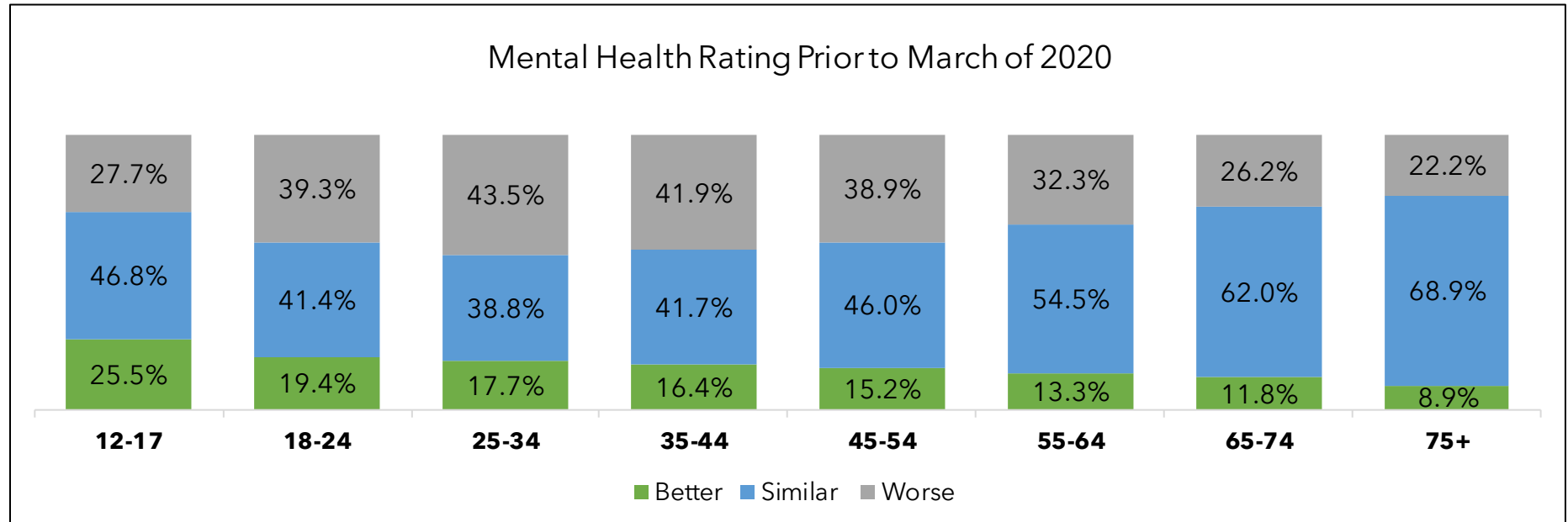
Figure 12

Physical and Mental Health Services

Participants were asked: "**Since March of 2020 (the start of the COVID-19 pandemic), if you sought services to address your mental health, including your mood, stress level and/or your ability to think, how often have you been able to get the services you need?**" Almost 1 out of 3 survey participants reported they were *'Sometimes or Never'* able to get the services they need (Figure 13).
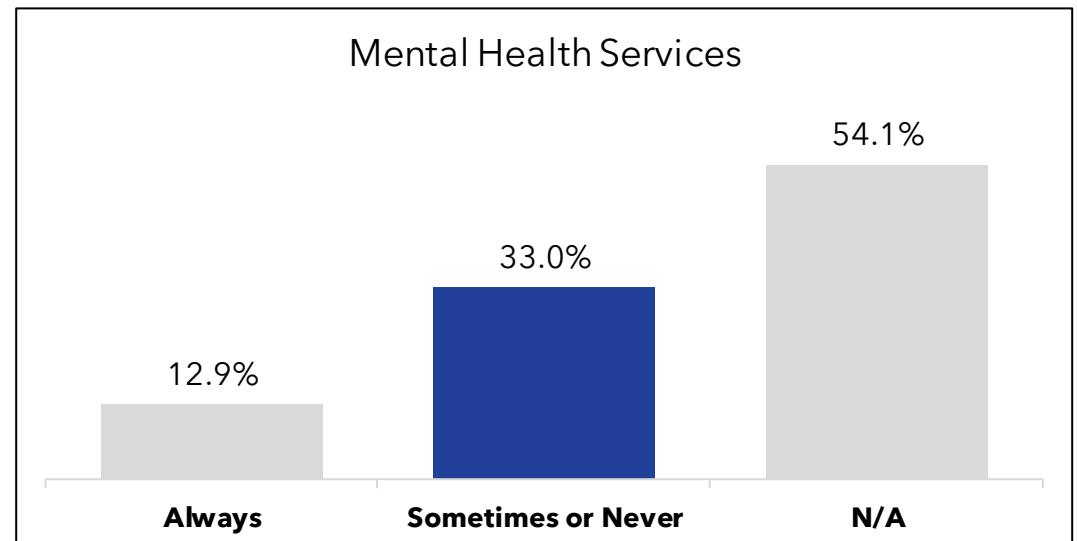
Mental Health Services

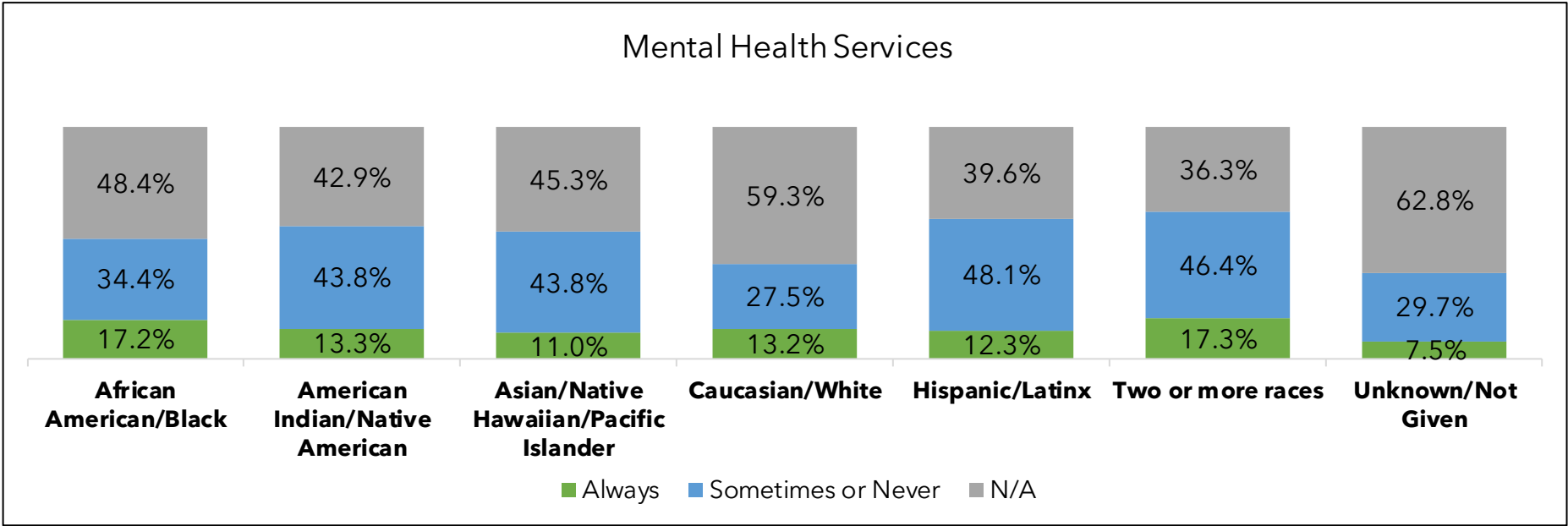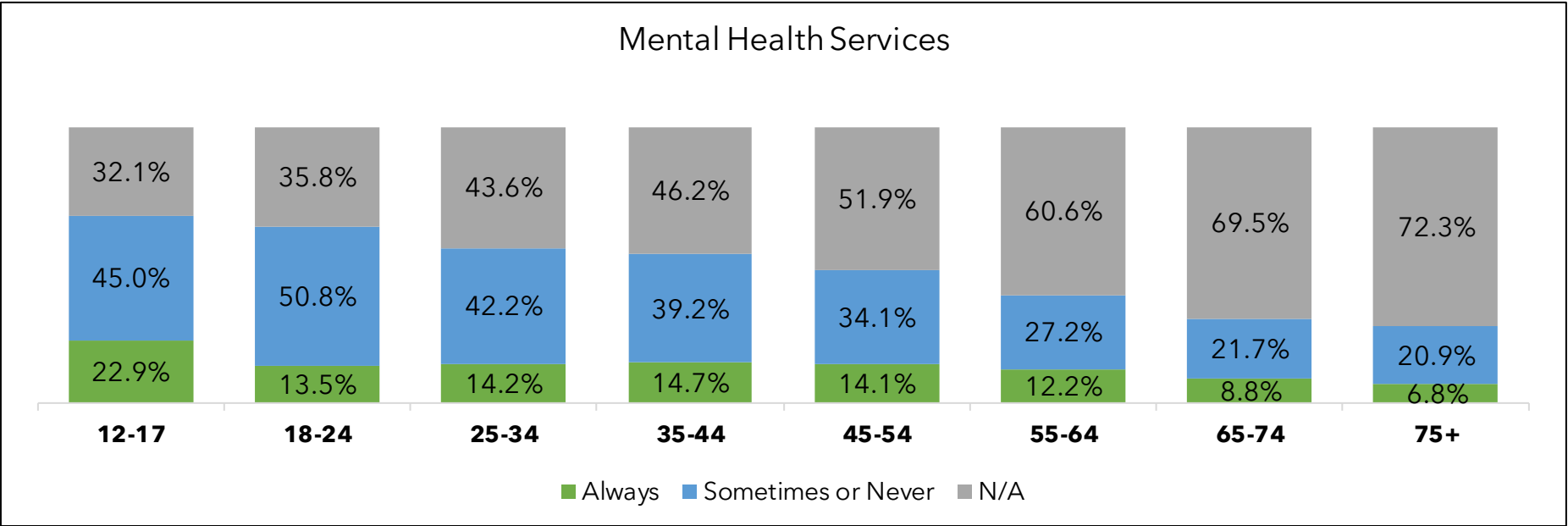| Always	Sometimes or Never	N/A
12.9%	33.0%	54.1%

Figure 13

Race/Ethnicity

Mental Health Services

Race/Ethnicity	Always	Sometimes or Never	N/A
African American/Black	17.2%	34.4%	48.4%
American Indian/Native American	13.3%	43.8%	42.9%
Asian/Native Hawaiian/Pacific Islander	11.0%	43.8%	45.3%
Caucasian/White	13.2%	27.5%	59.3%
Hispanic/Latinx	12.3%	48.1%	39.6%
Two or more races	17.3%	46.4%	36.3%
Unknown/Not Given	7.5%	29.7%	62.8%

Legend: ■ Always ■ Sometimes or Never ■ N/A

Figure 14

2021 Maricopa County COVID-19 Impact Community Health Assessment: Community Surveys Report

Age

Mental Health Services

Age	12-17	18-24	25-34	35-44	45-54	55-64	65-74	75+
N/A	32.1%	35.8%	43.6%	46.2%	51.9%	60.6%	69.5%	72.3%
Sometimes or Never	45.0%	50.8%	42.2%	39.2%	34.1%	27.2%	21.7%	20.9%
Always	22.9%	13.5%	14.2%	14.7%	14.1%	12.2%	8.8%	6.8%

■ Always ■ Sometimes or Never ■ N/A

Figure 15

Participants were asked: "**What services would have improved overall mental and physical health of your family in the last year?**" Most survey participants reported *'Assistance with mental health issues'* as a service that would have improved overall mental and physical health of their family (Figure 16).

Services to Improve Mental and Physical Health of Family
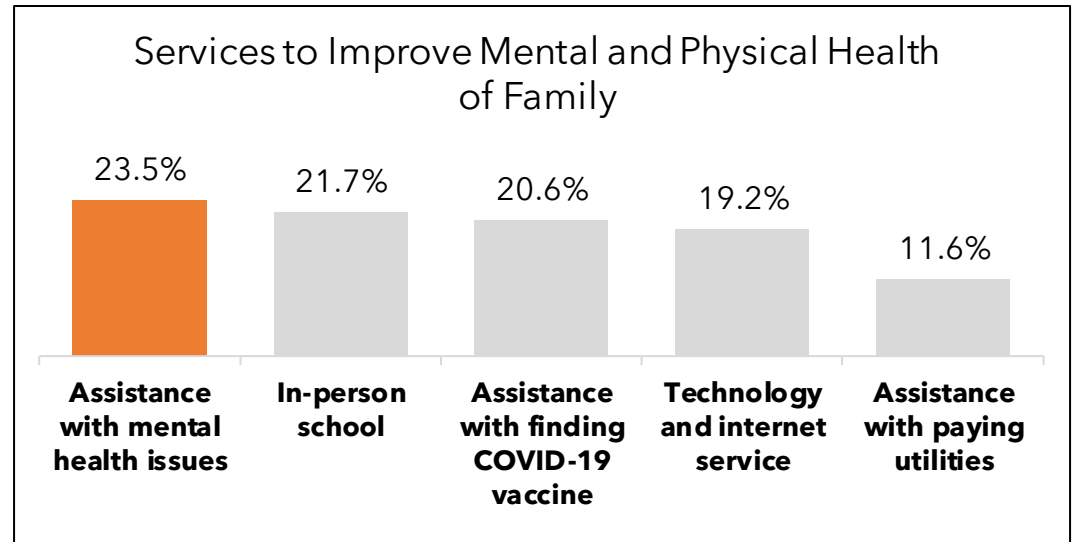
Figure 16

Most reported 'Other' responses:

- Teleworking alternatives
- Access to gyms
- Access to COVID-19 education
- Political environment around COVID-19
- Activities for socialization/isolation
- Assistance with caregiving
- Mask mandates
- Less restrictions

Race/Ethnicity

	1	2	3
African American/Black	Assistance with mental health issues	Technology and internet service	In-person school
American Indian/Native American	Technology and internet service	Assistance with paying utilities	
Asian/Native Hawaiian/Pacific Islander	Assistance with finding COVID-19 vaccine	Technology and internet service	
Caucasian/White	Assistance with mental health issues	Assistance with finding COVID-19 vaccine	
Hispanic/Latinx	In-person school	Assistance with mental health issues	Technology and internet service
Two or more races	Assistance with mental health issues	Technology and internet service	In-person school
Unknown/Not Given	In-person school	Assistance with finding COVID-19 vaccine	Technology and internet service

Figure 17

Age

	1	2	3
12-24	In-person school	Assistance with mental health issues	Technology and internet service
25-34	Assistance with mental health issues	Assistance with paying rent	Assistance with paying utilities
35-44	In-person school	Assistance with mental health issues	Technology and internet service
45-54			
55-64	Assistance with finding COVID-19 vaccine	Technology and internet service	Assistance with mental health issues
65-74			
75+			

Figure 18

Special Populations

	1	2	3
Adult with children under age 18 or living in the same home	In-person school	Assistance with mental health issues	Technology and internet service
Single parent	Assistance with mental health issues	In-person school	Technology and internet service
LGBTQI	Assistance with mental health issues	Technology and internet service	Assistance with finding COVID-19 vaccine
Person experiencing homelessness	Assistance with paying rent	Assistance with paying utilities	Technology and internet service
Person living with a disability	Assistance with mental health issues	Assistance with finding COVID-19 vaccine	Assistance with paying utilities
Immigrant	Technology and internet service	Assistance with finding COVID-19 vaccine	In-person school
Refugee	In-person school	Assistance with finding COVID-19 vaccine	Technology and internet service
Veteran	Assistance with finding COVID-19 vaccine	Technology and internet service	Assistance with mental health issues
Person living with HIV/AIDS	Assistance with mental health issues	Technology and internet service	Assistance with paying utilities

Figure 19

Healthcare/Living Expenses/Financial Assistance

Maricopa County residents were asked questions about being able to afford to pay for living and health care expenses. The wide impact of COVID-19 has urged federal government to provide financial assistance through stimulus payments, relief funding for families and businesses, unemployment, WIC, SNAP food stamps, and Medicaid insurance to those in need. In relation to healthcare and living expenses, residents were also asked questions about if they applied for financial assistance to assist with the essential cost of living expenses and for those who received a stimulus payment, what impact that had in alleviating their essential living expenses and access to healthcare. COVID-19 has shaped how long-term financial hardship weigh on many residents. Not only is being uninsured a barrier to accessing needed health care, but also not having adequate insurance or enough insurance coverage can also be a barrier. Uninsured adults are less likely to receive preventive services for chronic conditions and similarly, uninsured children are less likely to receive appropriate treatment for conditions like asthma or critical preventive services such as dental care, immunizations, and well-child visits that track developmental milestones. Inadequate health insurance coverage is one of the largest barriers to health care access, and the unequal distribution of coverage contributes to disparities in health care. Out-of-pocket medical expenses may lead individuals to delay or abandon needed care.[2] This section summarizes the results of survey questions related to healthcare expenses, living expenses, and financial assistance.

Paying for Essentials

Participants were asked: "**Since March of 2020, have you had enough money to pay for essentials such as: Food, Housing (Rent/Mortgage), Utilities, Car/Transportation, Insurance, Clothing/Hygiene Products, Medication/Treatments, Childcare, Tuition or Student Loans?**" Most survey participants reported that they *'Sometimes or Never'* had enough money to pay for medication/treatments (Figure 20).
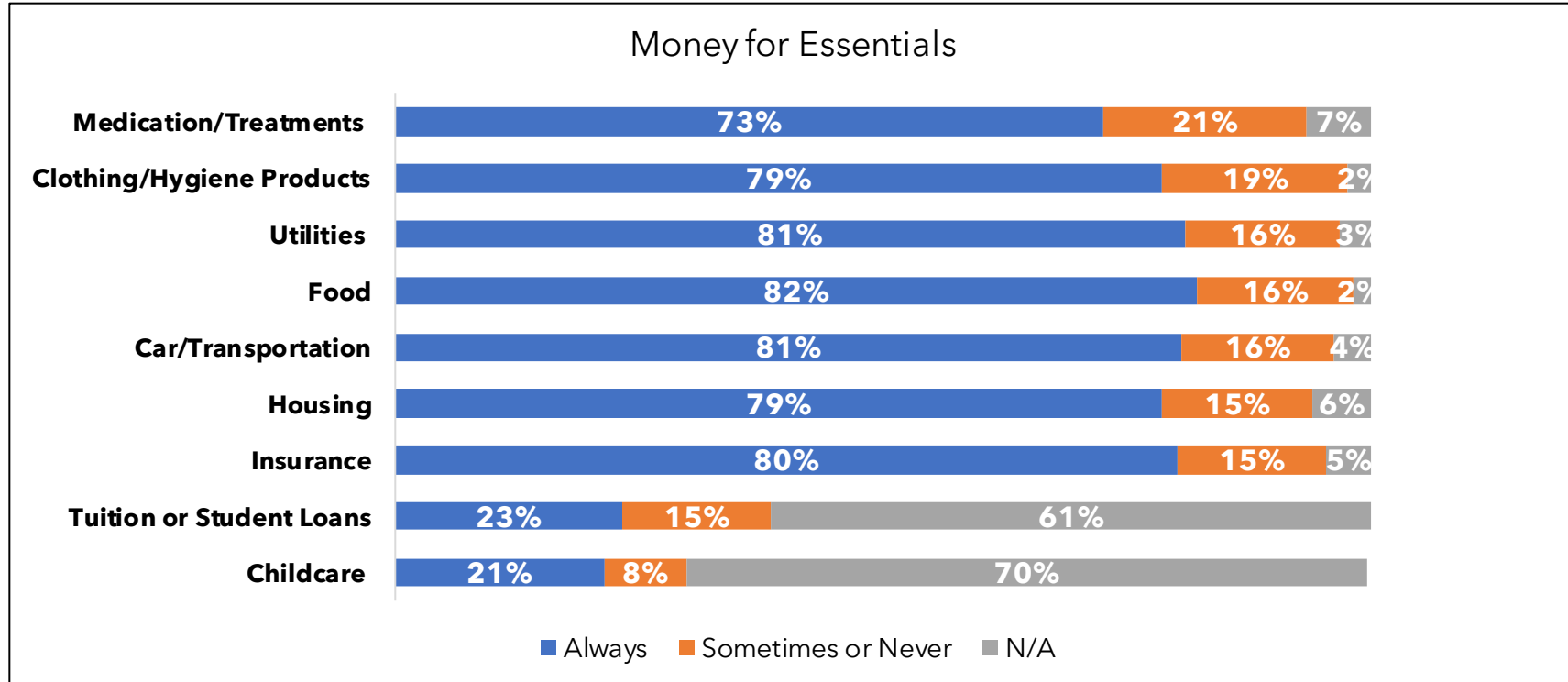

Money for Essentials

Category	Always	Sometimes or Never	N/A
Medication/Treatments	73%	21%	7%
Clothing/Hygiene Products	79%	19%	2%
Utilities	81%	16%	3%
Food	82%	16%	2%
Car/Transportation	81%	16%	4%
Housing	79%	15%	6%
Insurance	80%	15%	5%
Tuition or Student Loans	23%	15%	61%
Childcare	21%	8%	70%

Figure 20

Figures 21-23 show the top categories of respondents who 'Sometimes or Never' had enough money to pay for essentials broken out by race/ethnicity, age, and special populations. For each subcategory, the essential with the **highest value** is highlighted in **dark yellow**, followed by the second highest value highlighted in lighter yellow.

Top Categories Broken out by Race/Ethnicity

	Food	Housing	Utilities	Transportation	Insurance	Clothing	Medical	Childcare	Tuition
African American/Black	23.2%	24.7%	25.7%	27.2%	25.3%	25.3%	30.0%	13.4%	27.0%
American Indian/Native American	31.5%	34.2%	32.3%	29.6%	28.2%	33.5%	32.2%	18.7%	30.1%
Asian/Native Hawaiian/Pacific Islander	23.1%	22.3%	22.3%	21.6%	20.9%	22.4%	23.3%	11.6%	15.0%
Caucasian/White	10.6%	10.1%	10.4%	10.7%	10.3%	14.6%	16.0%	5.1%	11.1%
Hispanic/Latinx	28.0%	26.7%	28.3%	25.5%	26.2%	30.3%	32.6%	18.5%	25.9%
Two or more races	35.7%	29.8%	36.3%	30.5%	28.7%	35.7%	34.5%	19.6%	30.4%
Unknown/Not Given	17.7%	18.3%	18.2%	19.0%	18.4%	19.5%	24.1%	10.7%	14.2%

Figure 21

Top Categories Broken out by Age

	Food	Housing	Utilities	Transportation	Insurance	Clothing	Medical	Childcare	Tuition
12-17	16.6%	17.2%	16.9%	15.6%	13.5%	16.4%	15.4%	10.3%	15.6%
18-24	34.0%	33.3%	32.1%	36.0%	31.5%	36.6%	40.1%	12.2%	36.7%
25-34	23.4%	23.7%	23.7%	23.8%	22.7%	26.7%	29.4%	17.3%	30.5%
35-44	20.5%	19.6%	20.9%	19.1%	18.8%	24.3%	25.4%	16.6%	21.3%
45-54	15.4%	16.2%	16.8%	14.6%	15.0%	18.4%	20.9%	7.3%	16.0%
55-64	12.8%	11.3%	11.7%	12.0%	13.0%	16.1%	18.5%	4.2%	8.2%
65-74	8.9%	7.1%	8.0%	9.3%	8.5%	11.3%	12.0%	2.0%	3.6%
75+	5.0%	4.2%	5.0%	6.9%	4.7%	9.1%	8.5%	1.7%	1.4%

Figure 22

Top Categories Broken out by Special Populations

	Food	Housing	Utilities	Transportation	Insurance	Clothing	Medical	Childcare	Tuition
Adult with children under age 18 or living in the same home	18.9%	19.1%	19.9%	17.8%	17.4%	22.0%	24.0%	17.4%	20.2%
Single parent	31.3%	30.4%	30.4%	29.2%	27.9%	35.8%	36.1%	21.5%	28.8%
LGBTQI	27.4%	25.0%	24.9%	24.6%	23.2%	30.3%	30.7%	8.7%	24.3%
Person experiencing homelessness	61.0%	64.4%	62.7%	59.3%	55.9%	65.5%	58.6%	27.6%	50.0%
Person living with a disability	32.4%	26.9%	29.6%	31.8%	25.9%	40.1%	39.3%	8.0%	19.3%
Immigrant	23.1%	20.7%	20.9%	20.4%	25.4%	25.0%	30.7%	15.9%	19.7%
Refugee	22.7%	15.4%	17.2%	21.5%	15.6%	14.3%	14.1%	14.1%	15.6%
Veteran	10.4%	8.9%	9.2%	10.5%	9.8%	13.2%	14.0%	4.4%	9.0%
Person living with HIV/AIDS	45.3%	42.3%	43.4%	37.7%	37.7%	41.5%	41.5%	13.2%	22.6%

Figure 23

Financial Assistance

Participants were asked: "**Since March of 2020, have you applied for any of the following financial assistance due to the impact of the COVID-19 pandemic to assist with the essential cost of living expenses listed above?**" Most survey participants reported applying for *'Unemployment due to staying home to care for children, elderly parents or ill family members'* (Figure 24).

Financial Assistance to Assist with Essential Living Expenses

Category	Percentage
Unemployment due to staying home to care for children, elderly parents or ill family members	9.1%
COVID-19 Relief Funding for You/Family	8.6%
Medicaid Insurance	7.2%
SNAP Food Stamps	6.4%
Unemployment due to loss of job	6.3%
COVID-19 Relief Funding for your business	5.6%
Unemployment due to COVID-19 illness (self)	3.0%
WIC	2.0%

Figure 24

Figures 25 and 26 show the top categories of respondents who applied for financial assistance broken out by race/ethnicity and age. For each subcategory, the financial assistance type with the **highest value** is highlighted in **dark yellow**, followed by the second highest value highlighted in lighter yellow.

Top Categories Broken out by Race/Ethnicity

	COVID-19 Relief Funding for You/Family	COVID-19 Relief Funding for your business	Unemployment due to loss of job (laid off)	Unemployment due to staying home to care for children, elderly parents, or ill family members	Unemployment due to COVID-19 illness (self)	WIC	SNAP Food Stamps	Medicaid Insurance
African American/Black	13.5%	7.6%	10.8%	12.3%	4.3%	3.5%	11.6%	10.9%
American Indian/Native American	24.1%	4.4%	13.3%	16.3%	8.9%	3.9%	14.8%	13.3%
Asian/Native Hawaiian/Pacific Islander	13.1%	7.3%	9.3%	9.8%	4.1%	2.8%	7.3%	10.2%
Caucasian/White	6.2%	5.9%	5.2%	7.9%	1.9%	0.9%	3.7%	5.0%
Hispanic/Latinx	12.8%	3.7%	7.8%	11.1%	5.4%	5.5%	13.6%	12.7%
Two or more races	19.6%	7.1%	13.7%	19.6%	8.3%	6.0%	18.5%	14.3%
Unknown/Not Given	6.8%	5.7%	5.7%	10.0%	2.8%	1.3%	4.5%	5.8%

Figure 25

Top Categories Broken out by Age

	COVID-19 Relief Funding for You/Family	COVID-19 Relief Funding for your business	Unemployment due to loss of job (laid off)	Unemployment due to staying home to care for children, elderly parents, or ill family members	Unemployment due to COVID-19 illness (self)	WIC	SNAP Food Stamps	Medicaid Insurance
12-17	16.6%	6.3%	11.3%	7.9%	6.6%	10.0%	20.5%	16.8%
18-24	21.3%	4.0%	13.8%	18.3%	8.7%	4.3%	8.7%	10.6%
25-34	13.1%	3.2%	9.0%	12.9%	3.7%	4.8%	11.1%	11.1%
35-44	10.3%	6.7%	8.2%	10.8%	3.9%	3.2%	9.3%	9.0%
45-54	7.9%	7.9%	6.3%	9.5%	2.5%	1.0%	5.0%	6.4%
55-64	6.7%	5.8%	5.5%	8.1%	2.4%	0.6%	4.1%	5.7%
65-74	3.8%	4.2%	2.3%	5.2%	1.4%	0.5%	3.0%	4.2%
75+	2.8%	1.2%	1.0%	2.5%	0.5%	0.5%	1.6%	2.2%

Figure 26

Participants were asked: "**Since March of 2020, how often did you seek financial assistance to help pay for healthcare expenses (e.g., doctor bills, medications, medical treatments, doctor co-pay, etc.?**" Most survey participants reported *'Sometimes or Never'* (Figure 27).

Seek Financial Assistance For Healthcare Expenses

Always 2.5%
Sometimes or Never 82.2%
N/A 15.4%

Figure 27

Seek Financial Assistance for Healthcare Expenses

	Always	Sometimes or Never	N/A
African American/Black	4.5%	80.5%	15.1%
American Indian/Native American	3.9%	78.8%	17.2%
Asian/Native Hawaiian/Pacific Islander	3.8%	77.3%	18.9%
Caucasian/White	1.7%	83.9%	14.4%
Hispanic or Latinx	3.8%	79.6%	16.5%
Two or more races	9.5%	76.8%	13.7%
Unknown/Not Given	3.1%	77.4%	19.5%

Figure 28

Seek Financial Assistance for Healthcare Expenses

Age	Always	Sometimes or Never	N/A
12-17	7.4%	55.3%	37.4%
18-24	6.6%	72.5%	20.9%
25-34	3.7%	84.1%	12.3%
35-44	2.7%	83.6%	13.7%
45-54	2.3%	85.4%	12.4%
55-64	2.0%	83.3%	14.6%
65-74	1.0%	80.0%	19.0%
75+	1.0%	80.5%	18.5%

Figure 29

Stimulus Check Impact

Participants were asked: "**If you received a stimulus check in the fall of 2020 and spring of 2021, what impact did this have on alleviating your essential living expenses and access to healthcare?**" Over 2 out 5 survey participants reported that the stimulus check had a *'Strong or Moderate impact' (*Figure 30). For respondents who reported that the stimulus check had a weak impact, the question did not distinguish between situations where respondents a) had greater financial need than the payment covered, or b) had low financial need and therefore the payment didn't make a significant impact.

Stimulus Check Impact

Strong Impact	Moderate Impact	Weak Impact	No Impact/No difference	Did not Receive
20.6%	22.7%	11.6%	23.7%	21.4%
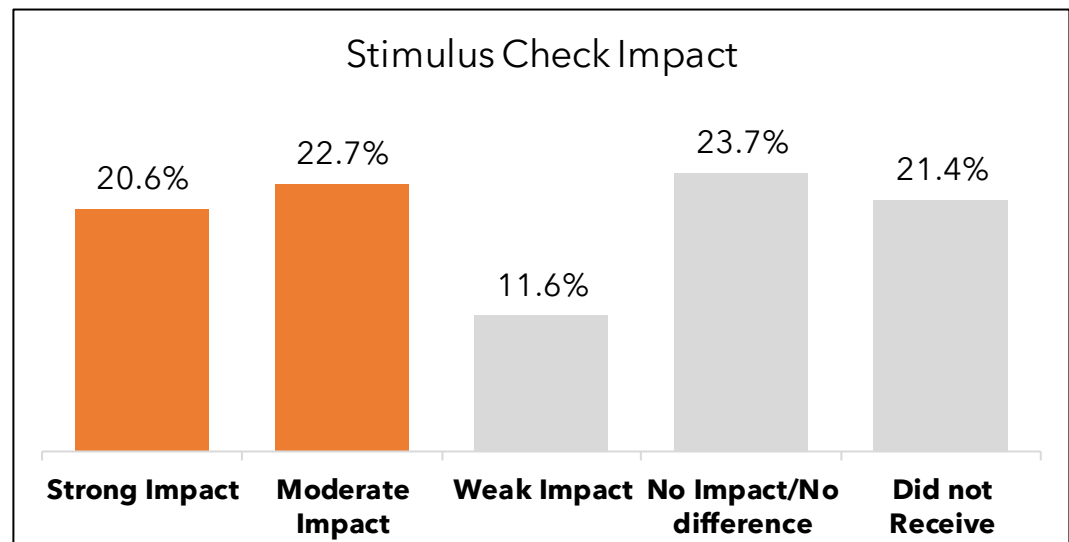
Figure 30

Race/Ethnicity

Stimulus Check Impact

Race/Ethnicity	Strong or Moderate Impact	Weak Impact	No Impact/No difference	Did not Receive
African American/Black	56.0%	13.0%		
American Indian/Native American	58.6%	12.8%		
Asian/Native Hawaiian/Pacific Islander	52.8%	10.6%		
Caucasian/White	38.0%	12.2%		
Hispanic/Latinx	58.3%	8.4%		
Two or more races	53.5%	14.3%		
Unknown/Not Given	29.4%	14.9%		

- Strong or Moderate Impact
- Weak Impact
- No Impact/No difference
- Did not Receive

Figure 31

Age

Stimulus Check Impact

Age	Strong or Moderate Impact	Weak Impact
12-17	45.5%	5.8%
18-24	54.6%	10.6%
25-34	58.2%	15.1%
35-44	47.2%	11.6%
45-54	40.1%	11.3%
55-64	38.6%	10.6%
65-74	37.5%	11.7%
75+	37.5%	12.5%

■ Strong or Moderate Impact ■ Weak Impact ■ No Impact/No difference ■ Did not Receive

Figure 32

Special Populations

Stimulus Check Impact

Population	Strong or Moderate Impact	Weak Impact
Adult with children <18 or living in the same home	48.0%	10.8%
Single parent	57.4%	14.5%
LGBTQI	50.8%	12.2%
Person experiencing homelessness	42.4%	25.4%
Person living with a disability	57.2%	15.6%
Immigrant	46.8%	9.7%
Refugee	43.1%	18.5%
Veteran	35.3%	12.3%
Person living with HIV/AIDS	41.5%	20.8%

■ Strong or Moderate Impact   ■ Weak Impact   ■ No Impact/No difference   ■ Did not Receive

Figure 33

COVID-19 Impact on Employment

Maricopa County residents were asked a question related to how their employment was impacted by COVID-19. The pandemic has rapidly changed the workplace and caused many residents to unexpectedly find themselves out of work or working additional hours to support the response. These challenges have had an economic ripple effect across Maricopa County as there continues to be a great likelihood for significant increases in unemployment.[3] With many of the adjustments employers have made, it may be reasonable to expect COVID-19 to permanently transform the workforce and the way the community will work by expanding the flexibility of remote work, expanding access to paid sick leave, and prioritizing mental health in the workplace.[4] This section summarizes the results of the survey question related to employment.

Participants were asked: "**Since March of 2020, was your employment impacted due to the COVID 19 pandemic?**" Most survey participants reported *'Continued working the same number of hours'* (Figure 34).

Most reported 'Other' responses:

- Retired
- Not working/didn't work
- Reduced pay/pay cuts
- Homemakers/stay at home parent
- Minor
- Quit due to safety of family/self, afraid to work, high risk group
- Continued to work with COVID measures
- Small business forced to close
- Leave of absence (did not quit) due to illness of self or family

Employment

Continued working the same amount of hours	Required to telework	Work hours were reduced	Required to continue working onsite	Laid off
38.9%	21.6%	9.9%	9.7%	6.2%
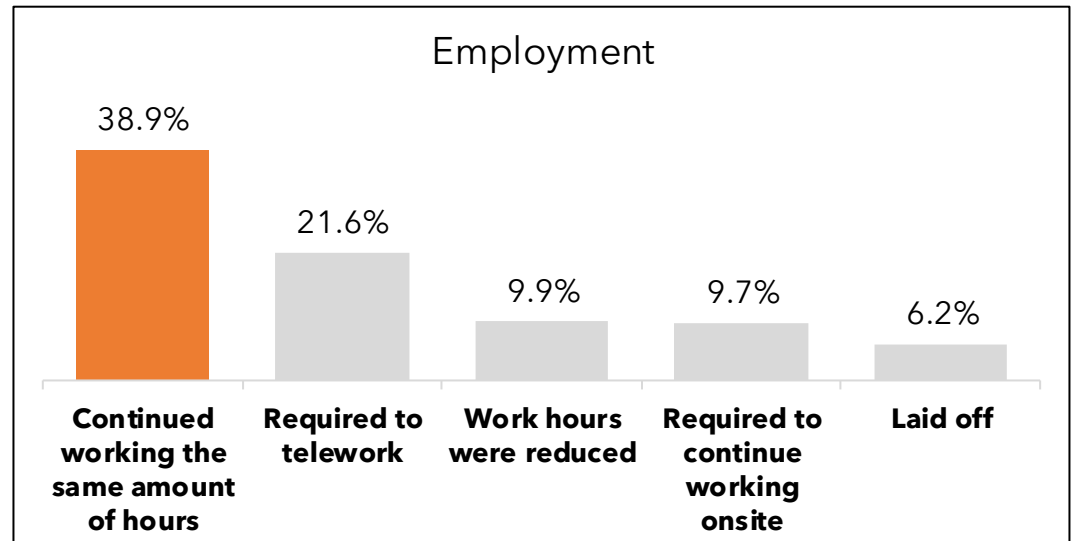
Figure 34

Race/Ethnicity

	1	2	3
African American/Black			Work hours were reduced
American Indian/Native American			Required to continue working onsite
Asian/Native Hawaiian/Pacific Islander	Continued working the same number of hours	Required to telework	Work hours were reduced
Caucasian/White			Required to continue working onsite
Hispanic/Latinx			Work hours were reduced
Two or more races			Required to continue working onsite
Unknown/Not Given			Work hours were reduced

Figure 35

Age

	1	2	3
12-24		Started a new job	Work hours were reduced
25-34			Required to continue working onsite
35-44	Continued working the same number of hours	Required to telework	Work hours were reduced
45-54			Required to continue working onsite
55-64			
65-74			Work hours were reduced
75+		Work hours were reduced	Laid off

Figure 36

Healthcare Payment Methods

Participants were asked: "**Since March of 2020, how do you currently pay for your healthcare including medications, dental, and health treatments?**" Most survey participants reported *'Health insurance provided through employer'* (Figure 37).

Top Healthcare Payment Methods

Health Insurance provided through employer	Health insurance purchased on my own or by family member	Use my own money (out of pocket)	Medicare	Medicaid/AHCCCS	Did not seek health care since March of 2020
54.9%	21.4%	19.3%	16.7%	9.1%	4.1%
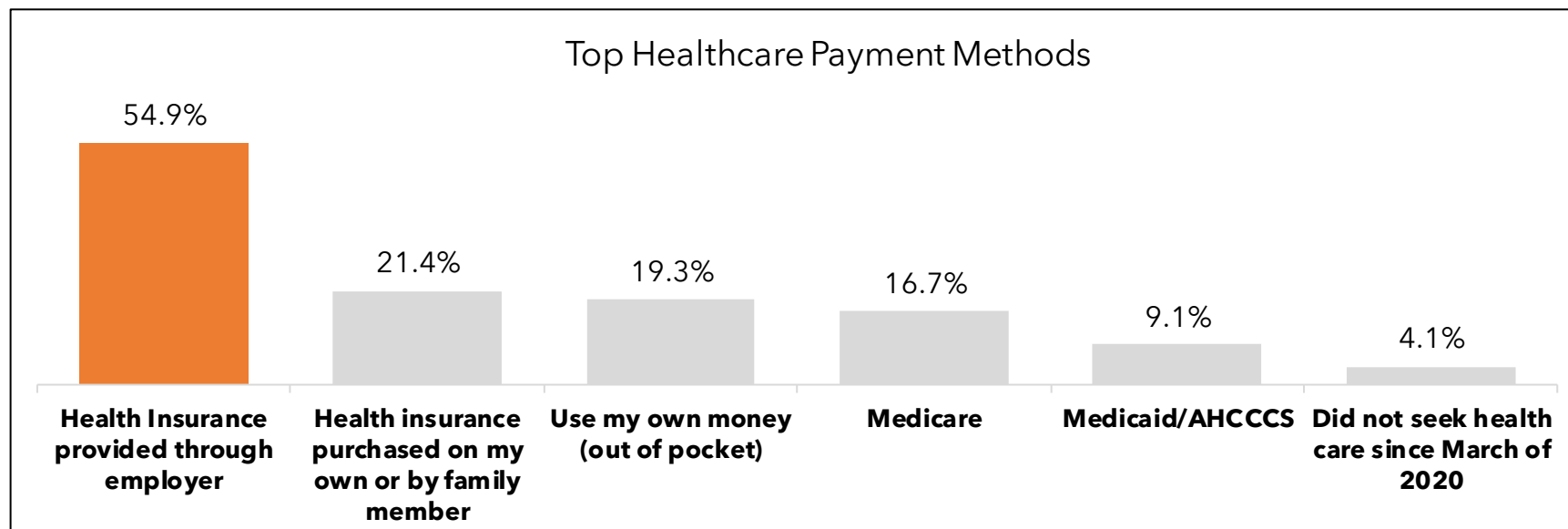
Figure 37

Most reported 'Other' responses:

- Uninsured
- Too young to work
- Seek medical care in Mexico
- Cost sharing program (e.g., Christian Ministries)

Race/Ethnicity

	1	2	3
African American/Black	Health insurance provided through employer	Health insurance purchased on my own or by family member	Medicare
American Indian/Native American		Indian Health Services	Use my own money (out of pocket)
Asian/Native Hawaiian/Pacific Islander		Health insurance purchased on my own or by family member	
Caucasian/White		Health insurance purchased on my own or by family member	Medicare
Hispanic/Latinx		Use my own money (out of pocket)	Medicaid/AHCCCS
Two or more races		Health insurance purchased on my own or by family member / Use my own money (out of pocket)	
Unknown/Not Given		Health insurance purchased on my own or by family member	Use my own money (out of pocket)

Figure 38

Age

	1	2	3
12-24	Health insurance purchased on my own or by family member	Health insurance provided through employer	Medicaid/AHCCCS
25-34	Health insurance provided through employer	Use my own money (out of pocket)	Health insurance purchased on my own or by family member
35-44			
45-54			
55-64		Health insurance purchased on my own or by family member	Use my own money (out of pocket)
65-74	Medicare		
75+			

Figure 39

Special Populations

	1	2	3
Adult with children under age 18 or living in the same home	Health insurance provided through employer	Health insurance purchased on my own or by family member	Use my own money (out of pocket)
Single parent		Medicaid/AHCCCS	
LGBTQI		Health insurance purchased on my own or by family member	
Person experiencing homelessness	Medicaid/AHCCCS	Health insurance provided through employer	Medicare
Person living with a disability	Medicare		Use my own money (out of pocket)
Immigrant	Health insurance provided through employer	Use my own money (out of pocket)	Health insurance purchased on my own or by family member
Refugee		Medicaid/AHCCCS	Medicare
Veteran		Medicare	Veterans' administration
Person living with HIV/AIDS		Medicaid/AHCCCS	Medicare

Figure 40

The Maricopa County Community

Maricopa County residents were asked questions related to their community. Health and well-being are strongly influenced by many factors outside of the medical care that is received, including the places where we grow up and the places where we work. These factors, called social determinants of health (SDOH), can impact the health and well-being of communities. SDOH such as social and economic factors are closely linked with health outcomes and can contribute to health disparities or differences in health between groups of people. Addressing SDOH means targeting the root causes that contribute to poor health. SDOH that impact health and well-being include the following: income/poverty, housing, transportation, education, healthcare services, employment, social support, availability of safe streets and green space, access to nutritious foods, and racism/discrimination.[5] This section summarizes the results of survey questions related to primary barriers to seeking or accessing healthcare in the community, strengths in the community, health conditions, and issues that impact the community.

Community Barriers

Participants were asked: "**Since March of 2020, what have been the primary barriers to seeking or accessing healthcare in your community?**" Almost half (46%) of respondents indicated '*I have not experienced any barriers*. Most survey participants reported '*Fear of exposure of COVID-19 in a healthcare setting*' (Figure 41).

Top 3 Community Barriers

28.2% — Fear of exposure of COVID-19 in a healthcare setting

14.7% — Unsure if healthcare need is a priority during this time

11.6% — Difficulty finding the right provider for my care
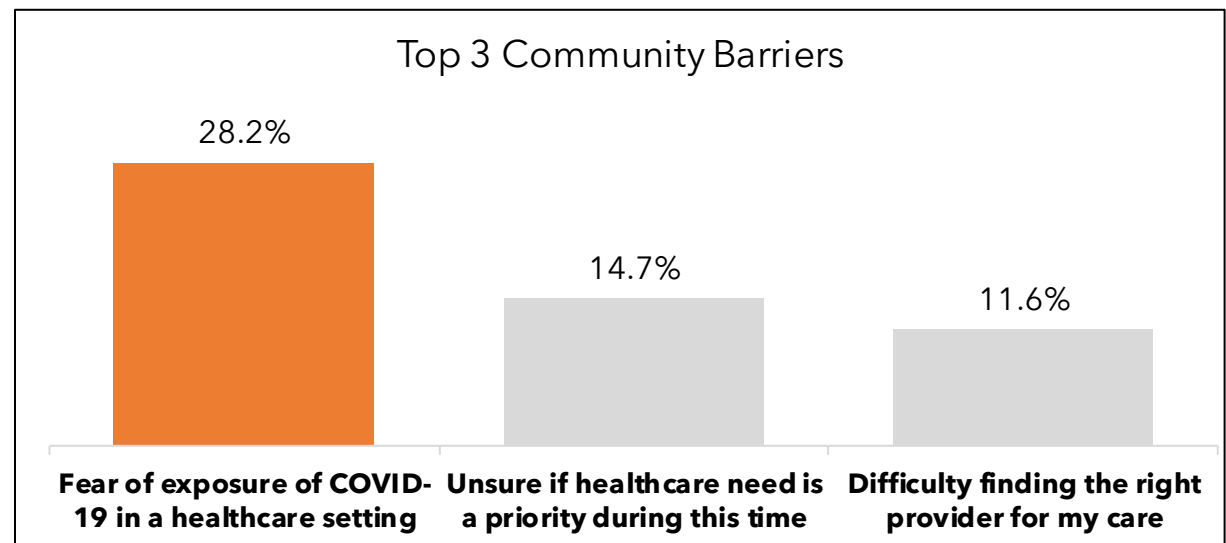
Figure 41

Most reported 'Other' responses:

- Lack of available appointments
- Dislike of telehealth
- Mask refusal

Race/Ethnicity

	1	2	3
African American/Black	Fear of exposure to COVID-19 in a healthcare setting	Difficulty finding the right provider for my care	Not enough health insurance coverage
American Indian/Native American		Inconvenient office hours	Unsure if healthcare need is a priority during this time
Asian/Native Hawaiian/Pacific Islander		No health insurance coverage	
Caucasian/White		Unsure if healthcare need is a priority during this time	Difficulty finding the right provider for my care
Hispanic/Latinx		No health insurance coverage	
Two or more races		Difficulty finding the right provider for my care	Unsure if healthcare need is a priority during this time
Unknown/Not Given			

Figure 42

Age

	1	2	3
12-24	Fear of exposure to COVID-19 in a healthcare setting	Unsure if healthcare need is a priority during this time	Difficulty finding the right provider for my care
25-34			
35-44			
45-54			
55-64			
65-74			
75+		Difficulty finding the right provider for my care	Unsure if healthcare need is a priority during this time

Figure 43

Special Populations

	1	2	3
Adult with children under age 18 or living in the same home	Fear of exposure of COVID-19 in a healthcare setting	Unsure if healthcare need is a priority during this time	Difficulty finding the right provider for my care
Single parent			
LGBTQI			
Person experiencing homelessness		Inconvenient office hours	Transportation to appointments
Person living with a disability		Difficulty finding the right provider for my care	Unsure if healthcare need is a priority during this time
Immigrant		No health insurance coverage	Inconvenient office hours
Refugee		Inconvenient office hours	Difficulty finding the right provider for my care
Veteran		Unsure if healthcare need is a priority during this time	
Person living with HIV/AIDS		Difficulty finding the right provider for my care	Inconvenient office hours

Figure 44

Community Strengths

Participants were asked: "**Since March of 2020, what have been the greatest strengths of your community?**" Most survey participants reported *'Access to COVID-19 vaccine events'* (Figure 45).

Top 3 Community Strengths

- Access to COVID-19 vaccine events: 46.7%
- Access to COVID-19 testing events: 41.1%
- Access to safe walking and biking routes: 29.7%
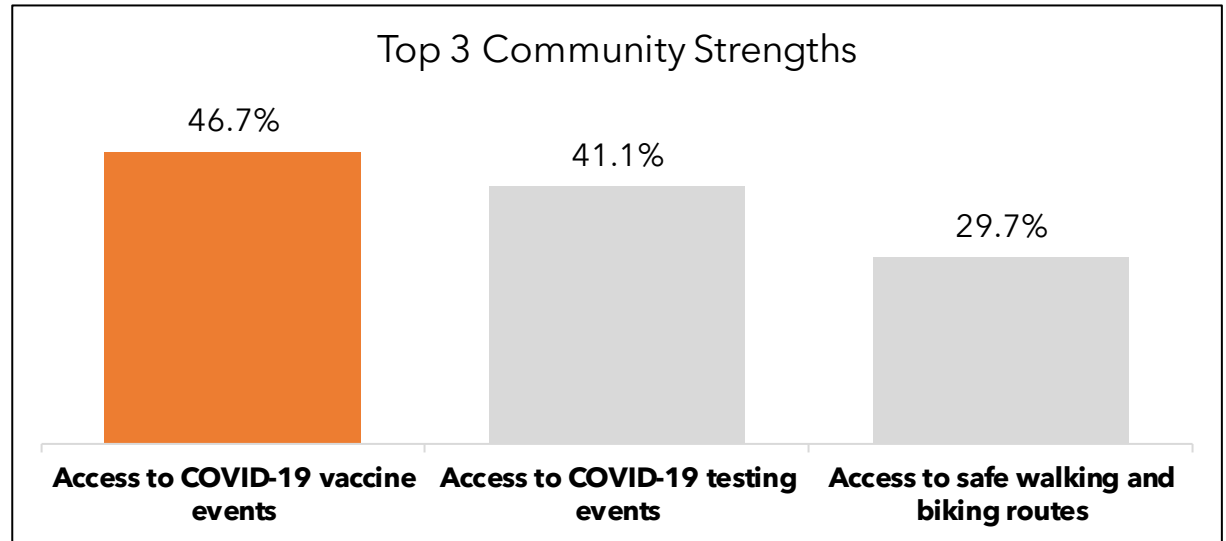
Figure 45

Most reported 'Other' responses:

- Ability to keep business open
- Most of these services were closed
- Put on personal 'lock down' during pandemic and didn't leave home
- Ability to order groceries/services online

Race/Ethnicity

	1	2	3
African American/Black	Access to COVID-19 testing events	Access to COVID-19 vaccine events	Access to religious or spiritual events
American Indian/Native American			Access to school or school alternatives
Asian/Native Hawaiian/Pacific Islander	Access to COVID-19 vaccine events	Access to COVID-19 testing events	Access to support networks such as neighbors, friends, and family
Caucasian/White			Access to safe walking and biking routes
Hispanic/Latinx	Access to COVID-19 testing events	Access to COVID-19 vaccine events	Access to school or school alternatives
Two or more races			Access to safe walking and biking routes
Unknown/Not Given	Access to COVID-19 vaccine events Access to safe walking and biking routes		Access to parks and recreations sites

Figure 46

Age

	1	2	3
12-24	Access to COVID-19 testing events	Access to COVID-19 vaccine events	Access to school or school alternatives
25-34			Access to parks and recreations sites
35-44	Access to COVID-19 vaccine events	Access to COVID-19 testing events	Access to safe walking and biking routes
45-54			
55-64			
65-74		Access to safe walking and biking routes	Access to COVID-19 testing events
75+		Access to medical care	

Figure 47

Special Populations

	1	2	3
Adult with children under age 18 or living in the same home	Access to COVID-19 vaccine events	Access to COVID-19 testing events	Access to schools or school alternatives
Single parent	Access to COVID-19 testing events	Access to COVID-19 vaccine events	Access to safe walking and biking routes
LGBTQI	Access to COVID-19 vaccine events	Access to COVID-19 testing events	Access to parks and recreation sites
Person experiencing homelessness	Access to COVID-19 testing events	Access to COVID-19 vaccine events	Accepting of diverse residents and cultures
Person living with a disability	Access to COVID-19 vaccine events	Access to COVID-19 testing events	Access to medical care
Immigrant			Access to parks and recreation sites
Refugee	Access to COVID-19 testing events	Access to COVID-19 vaccine events	Access to clean environments and streets Access to medical care
Veteran	Access to COVID-19 vaccine events	Access to COVID-19 testing events	Access to safe walking and biking routes
Person living with HIV/AIDS			

Figure 48

Health Conditions

Participants were asked: "**Since March of 2020, in addition to COVID-19, which health conditions have had the greatest impact on your community's overall health and wellness?**" Most survey participants reported *'Mental health issues'* (Figure 49).

Top 3 Community Health Conditions
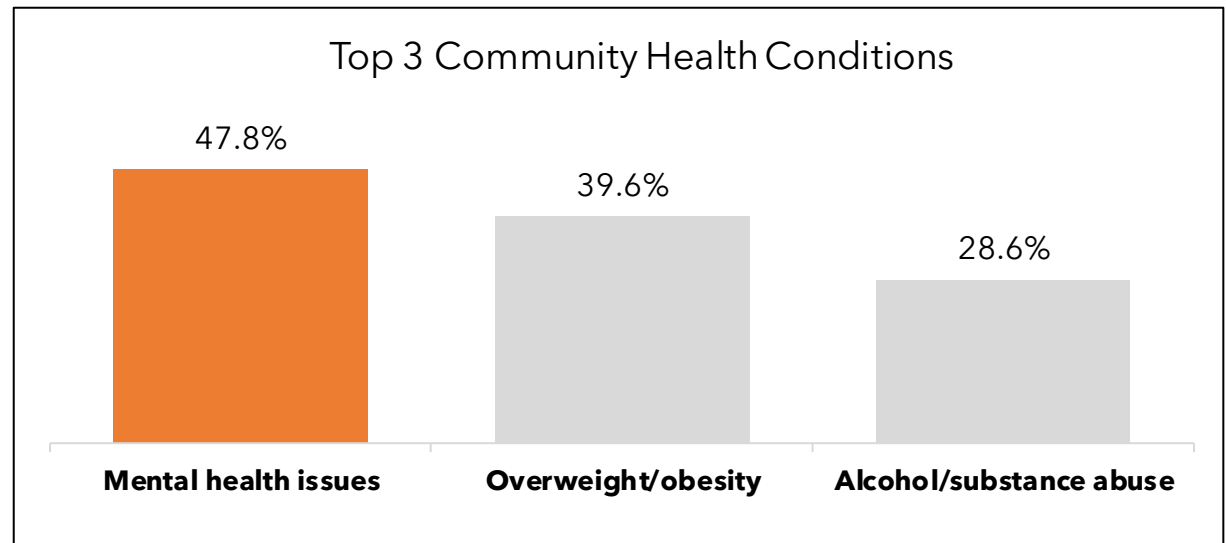
Figure 49

Most reported 'Other' responses:

- Old age
- Homelessness
- Fear

Race/Ethnicity

	1	2	3
African American/Black	Overweight/obesity	Mental health issues	High blood pressure or cholesterol
American Indian/Native American			Alcohol/Substance abuse
Asian/Native Hawaiian/Pacific Islander	Mental health issues	Overweight/ obesity	High blood pressure or cholesterol
Caucasian/White			Alcohol/Substance abuse
Hispanic/Latinx			
Two or more races			
Unknown/Not Given			

Figure 50

Age

	1	2	3
12-24	Mental health issues	Overweight/obesity	Alcohol/Substance abuse
25-34			
35-44			
45-54			
55-64			
65-74	Overweight/obesity	Mental health issues	
75+	High blood pressure or cholesterol	Overweight/ obesity	Mental health issues

Figure 51

Special Populations

	1	2	3
Adult with children under age 18 or living in the same home	Mental health issues	Overweight/obesity	Alcohol/substance abuse
Single parent			
LGBTQI			
Person experiencing homelessness			
Person living with a disability			
Immigrant	Overweight/obesity	Mental health issues	High blood pressure or cholesterol
Refugee		High blood pressure or cholesterol	Diabetes Alcohol/substance abuse
Veteran		Mental health issues	Alcohol/substance abuse
Person living with HIV/AIDS	Mental health issues	Overweight/obesity	HIV/AIDS

Figure 52

Community Issues

Participants were asked: "**Since March of 2020, which of the following issues have had the greatest impact on your community's health and wellness?**" Most survey participants reported *'Lack of people immunized to prevent disease'* (Figure 53).

Top 3 Community Issues

Lack of people immunized to prevent disease	Distracted driving	Homelessness
29.5%	28.5%	25.8%
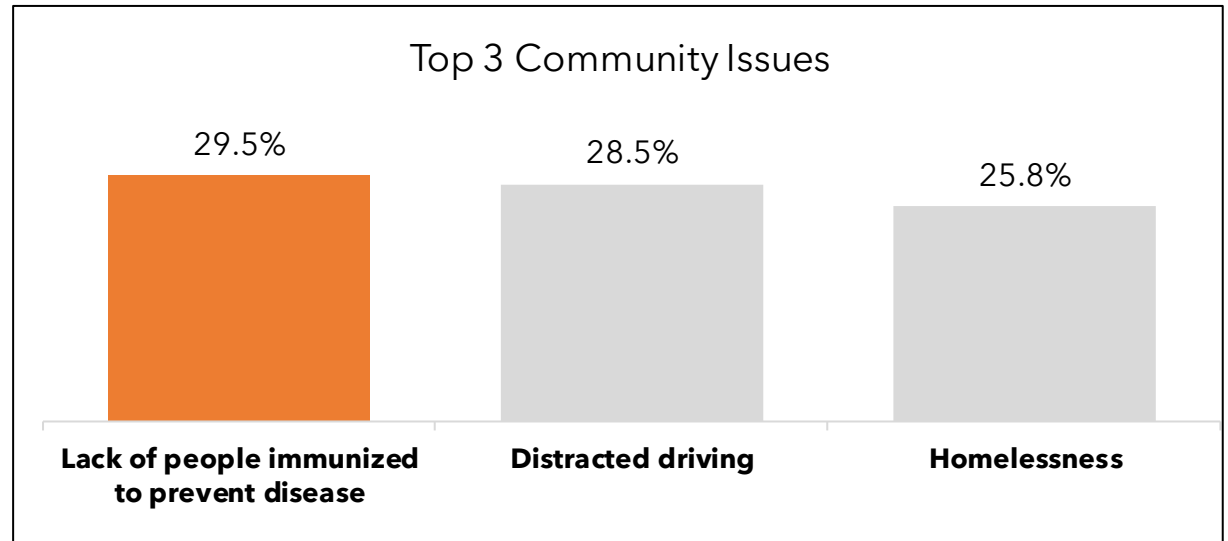
Figure 53

Most reported 'Other' responses:

- Didn't know how to respond or speak for their community
- Political environment
- COVID
- Fear of the future, COVID, economy
- Mental health

Race/Ethnicity

	1	2	3
African American/Black	Racism/discrimination	Lack of affordable housing	Homelessness
American Indian/Native American	Homelessness	Distracted driving	Lack of affordable housing
Asian/Native Hawaiian/Pacific Islander	Racism/discrimination	Lack of people immunized to prevent disease	Lack of affordable housing
Caucasian/White	Lack of people immunized to prevent disease	Distracted driving	Homelessness
Hispanic/Latinx	Homelessness	Lack of affordable housing	Distracted driving
Two or more races	Homelessness	Racism/discrimination	Lack of affordable housing
Unknown/Not Given	Distracted driving	Homelessness	Lack of affordable housing

Figure 54

Age

	1	2	3
12-24	Racism/discrimination	Lack of jobs	Homelessness
25-34	Lack of affordable housing	Homelessness	Lack of people immunized to prevent disease
35-44	Lack of people immunized to prevent disease	Homelessness	Lack of affordable housing
45-54	Lack of people immunized to prevent disease	Distracted driving	Homelessness
55-64	Distracted driving	Lack of people immunized to prevent disease	Homelessness
65-74	Lack of people immunized to prevent disease	Distracted driving	Homelessness
75+	Lack of people immunized to prevent disease	Distracted driving	Lack of COVID-19 vaccine access

Figure 55

Special Populations

	1	2	3
Adult with children under age 18 or living in the same home	Lack of people immunized to prevent disease	Distracted driving	Lack of affordable housing
Single parent	Lack of affordable housing	Homelessness	Lack of people immunized to prevent disease
LGBTQI	Racism/discrimination	Lack of affordable housing Homelessness	
Person experiencing homelessness	Lack of affordable housing Homelessness		Racism/discrimination
Person living with a disability	Lack of people immunized to prevent disease	Lack of affordable housing	Homelessness
Immigrant	Homelessness	Distracted driving Racism/discrimination	
Refugee	Distracted driving	Racism/discrimination	Lack of people immunized to prevent disease
Veteran		Lack of people immunized to prevent disease	Homelessness
Person living with HIV/AIDS	Racism/discrimination		

Figure 56

Survey Usability

Maricopa County residents were asked about the usability of the electronic survey and how easy it was to navigate and understand the provided questions and answer choices. Conducting a survey usability assessment allows an in-depth evaluation of respondent interactions and how those interactions affected the quality of the survey.[6] This assessment can especially be beneficial to help guide future survey improvement efforts by allowing respondents to provide quality responses and reducing the quantity of partial responses. To better capture the needs of community residents, all surveys were provided in 13 languages (Arabic, Burmese, Chinese, English, French, Kinyarwanda, Korean, Lao, Spanish, Swahili, Tagalog, Thai, and Vietnamese). The availability of diverse survey translations significantly influenced survey usability and helped ensure adequate population representation among Maricopa County residents. The survey platform Alchemer© was utilized to develop the COVID-19 impact survey and quick response (QR) codes were created for printed promotional materials and easy accessibility.

The MCDPH team minimized the use of paper surveys due to wastage, survey length, and limited staff capacity to input surveys into the platform. The adjustment to becoming less resource-intensive was optimal to achieve wide geographical population coverage.[7] With many technological advancements, QR codes have become a convenient tool for quick and easy access to online surveys.[7] Implementing QR code access for the community maximizes the scalability, reliability, and speed of data collection, while minimizes administrative expenses.[8] Another unique feature of Alchemer© was the language bar which allowed respondents to select their preferred language to take the survey in. To support easy survey usability, Alchemer© also ensured that all fields of the survey such as button text and error messages were translated into the respondent's preferred language.[8] Although Alchemer© had limited tools to track specific questions where respondents dropped off in the survey, they offered *Page Path*. *Page Path* is a feature that displays what pages were seen and worked through by a respondent. For future survey implementation efforts, it may be advantageous to group survey questions into categorized pages to utilize the *Page Path* feature for identifying and improving questions with low response rate. This section summarizes the results of survey questions related to survey usability.

Participants were asked: "**Overall, how easy was it to navigate this electronic survey?**" Most survey participants reported *'Very easy to use'* (Figure 57).

Survey Navigation

Very easy to use	Easy to use	Neither easy nor difficulty to use	Difficult to use	Very difficult to use
56.1%	25.6%	8.1%	1.2%	0.4%
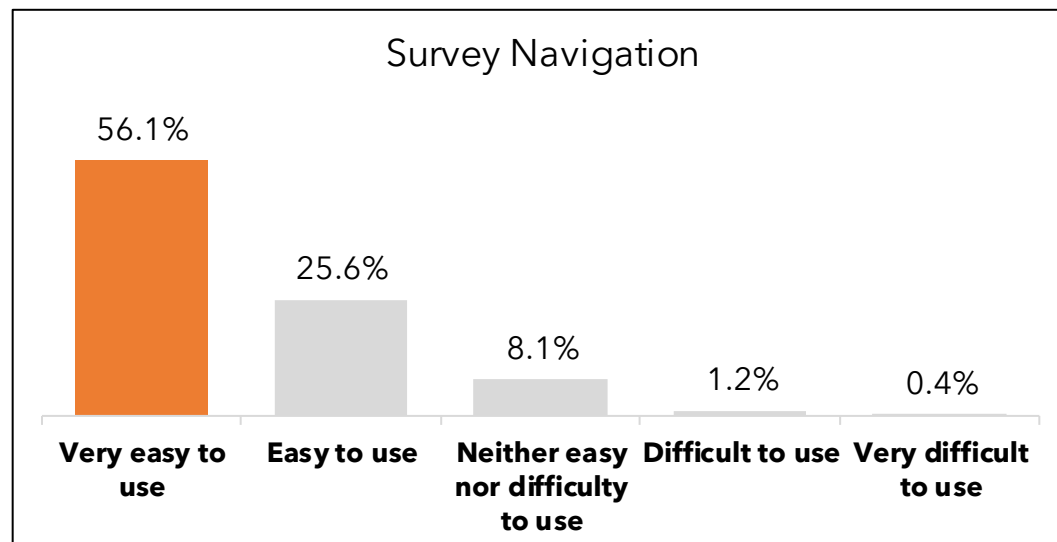
Figure 57

Participants were asked: "**Based on the given survey questions above, the information provided was easy to understand.**" Most survey participants reported *'Strongly agree'* (Figure 58).

Survey Information was Easy to Understand

Strongly agree	Agree	Neutral	Disagree	Strongly disagree
41.2%	37.5%	10.5%	1.8%	0.3%
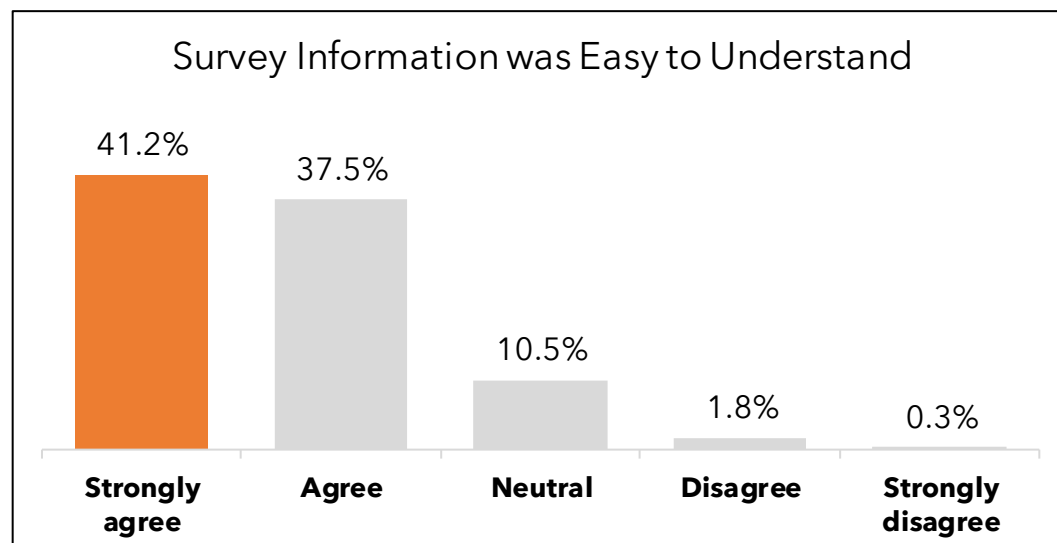
Figure 58

Other Noteworthy COVID-19 Experiences

Maricopa County residents were asked to share their experiences with COVID-19 that were not addressed throughout the survey. The MCDPH team also gave community members the opportunity to share more of their stories of adversity, resilience, and hope throughout the pandemic. If there was any interest, residents were asked to share their email address or phone number to be contacted from the communications team to share their experiences. COVID-19 has shifted the way that the community live and work, and although everyone may have varying contexts, Maricopa County residents have some level of shared experience. It is through shared experience that MCDPH and the community have learned how to pivot and come together to overcome this pandemic. This section summarizes the results of survey questions related to other noteworthy COVID-19 experiences.

Participants were asked: "**What else would you like to share with us regarding your experience with COVID-19 that we didn't ask?**" A thematic analysis was conducted to rank the top ten key themes and some exemplary quotes are provided in the table below (Figure 59).

Rank	Key Themes	Exemplary Quotes
1	Vaccine availability and registration process, opinions on effectiveness and regulation	"Finding vaccine event sites was difficult. I wish there would have been some centralized easier to use resources." "Frustration with pushing a vaccine which has not been FDA approved."
2	Mental health impact (loneliness, anxiety, stress, fear, depression, isolation, family/social relationships, etc.)	"Having to stay in and not see my husband in a memory care facility the last 4 months of his life was devastating!" "I would like to share that a lot of families were torn because of the pandemic not only because of the disease itself required us to isolate but because of so many differing opinions."

3	Politicization of responses, opinions on politicians, minimized community support, distrust in others, personal freedom	"These political manipulators flat-out lied to us and people died because of it." "People were pushed into fear that was continued long after it needed to be and too many people were shunned or treated negatively for opinions that were different from others."
4	Effectiveness and accuracy of communication, public information, social media, and news coverage	"The level of anger and disinformation made the year very difficult." "For me and my family, the lack of an organized plan across the US and the ever changing, conflicting messages coming out of the Federal and State government caused fear and anxiety run amok."
5	Opinions and practicing of preventative COVID-19 measures (social distancing, wearing a mask) excluding vaccination	"Stop mandating masks and social distancing in schools. I am a teacher, and it makes EVERYTHING harder and more complicated." "I don't trust people who won't wear masks when they're out in the general population. Too many people have lied about anything regarding COVID-19; I'll keep wearing my mask and practicing social distancing."
6	Hardships with unemployment, income, acquiring living essentials (housing, utilities, technology/internet, bills, transportation, groceries)	"The economical impact on my small business from COVID-19 and the ways that our government handled the crisis was very hard…I did not qualify for any government help and now I'm unsure if my business will even survive…" "Unemployment was beneficial. I have returned to work but could not find full time position. Underemployment is not easily accessible."
7	Benefits or challenges to changes in business practices/policies, economic impact of business closures	"The most positive thing was work allowing telecommuting." "I am a nurse and working this past year has been incredibly challenging. We are losing acute care nurses, they are tired, burnt out, and patients and families verbal abuse is escalating the issue."

8	COVID-19 illness/death experienced by self or someone they know	"I was affected by family members dying from COVID which changed mental health of remaining family members and our living situation." "I lost my mother due to COVID last June and it was difficult not being able to see her and be with her in the hospital."
9	Impact of school and childcare facility closures, modified childcare needs, changes to education delivery (virtual learning)	"…Remote schooling does not work well with the average household of working parents of single parents…" "Kids being isolated from other kids and unable to go to the parks and be in school to learn with other kids has been difficult."
10	Experience of those with or caregivers of people with disabilities or chronic health conditions including long-term health effects from COVID-19	"Long term effects from COVID-19 definitely are taking a daily toll mentally and physically for me personally along with my husband." "We didn't leave our house except to get vaccinated. It was 442 days inside due to a weakened immune system…In order to stay safe physically, we were trapped inside, and mental health/morale was low."

Figure 59

In addition to those identified key themes, some of the less frequently occurring themes included:

- Unaffected by COVID-19 or opportunities identified from COVID-19 (teleworking)
- Access to timely and appropriate medical care and treatment
- Experiences of frontline and medical workers
- Impact on seniors and retirees
- Improvements and challenges to personal health/fitness
- Experience caring for aging or ill family members/Experience with nursing home facilities

- Access to public spaces (parks, gyms, libraries, etc.) and events
- Access to COVID-19 testing services
- Experiences with racism/discrimination, language barriers, and impact of documentation status
- Impact on religious organizations
- Impact on travel and vacations
- Experience of those with alcohol and substance abuse and those in recovery
- Changes in crime, vandalism, reckless driving

Participants were asked: "**Want to tell us more? We want to share community members' stories. Let us know you're interested by indicating your type of experience along with sharing your email address/phone so we can contact you.**" Most survey participants were interested in sharing more of their experiences with COVID and mostly reported that 'A friend or family member experienced COVID-19' (Figure 60).

Over 1 in 5 respondents indicated that a friend or family member experienced COVID-19.

21% (2,998) — A friend or family member experienced COVID-19.
19% (2,767) — Work was impacted by COVID-19.
12% (1,660) — I experienced COVID-19.
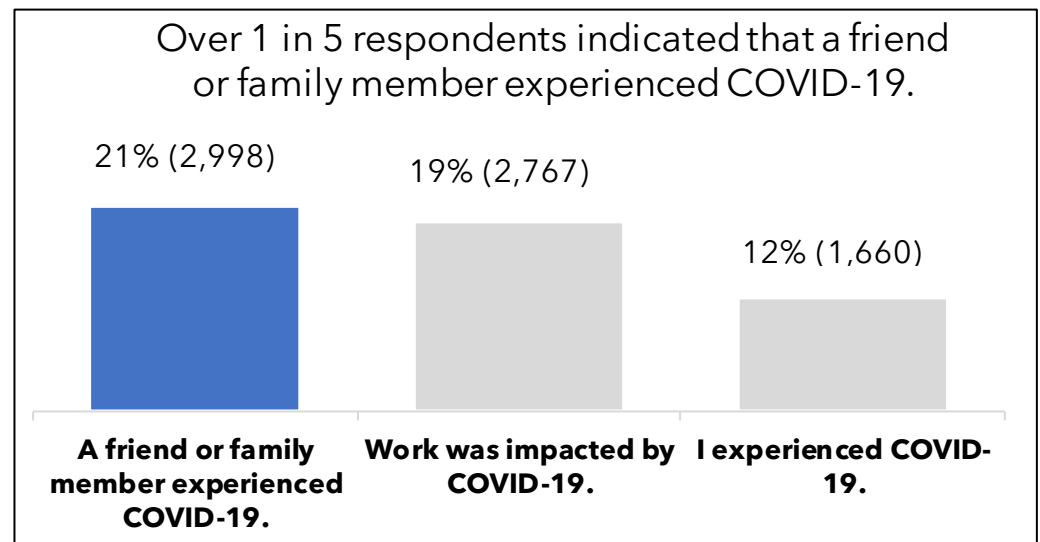
Figure 60

Appendix A: Regional Profiles

https://www.maricopa.gov/5614/Regional-Profiles

Northeast Region
Northwest Region
Central Region
Southeast Region
Southwest Region
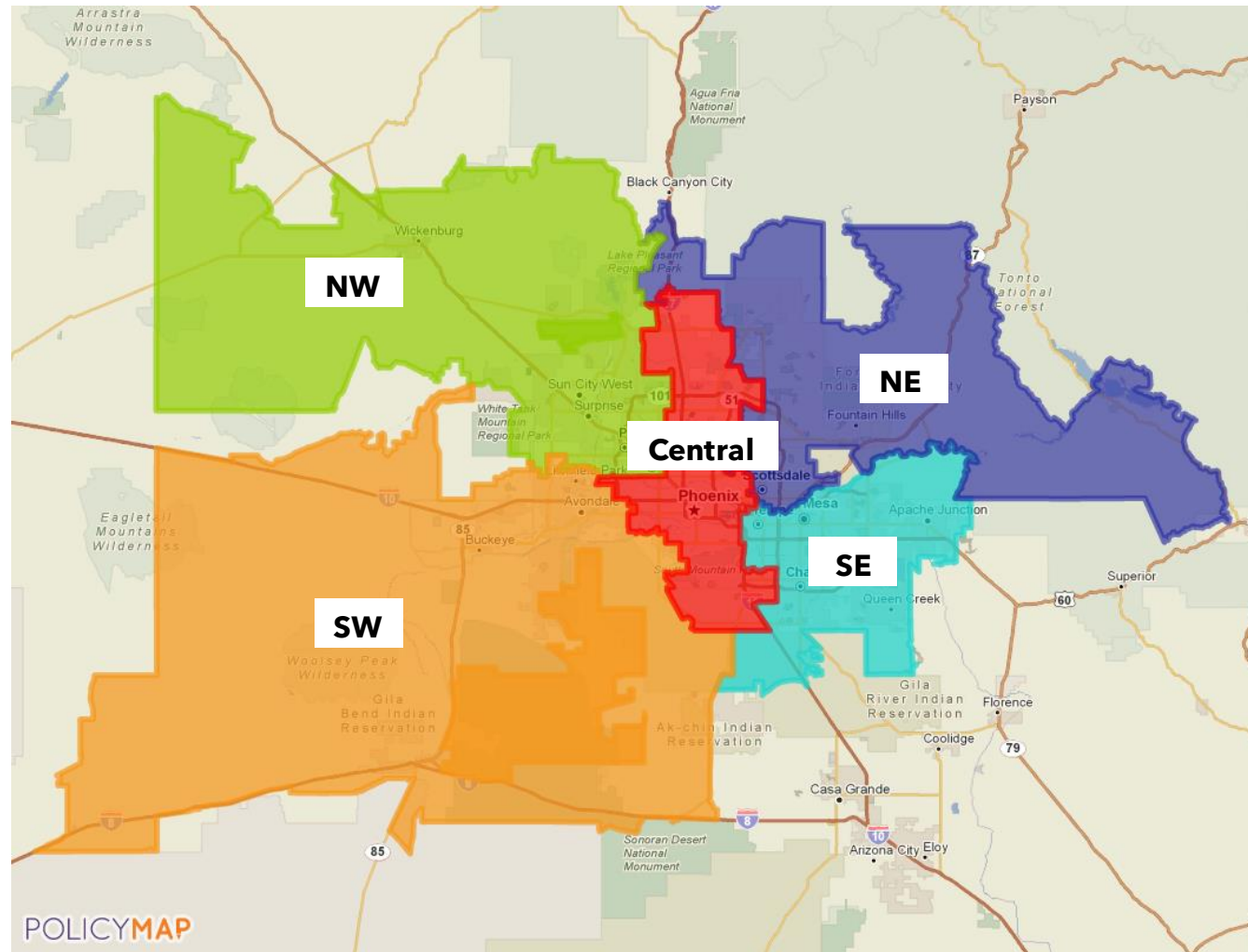
Appendix B: City Profiles

https://www.maricopa.gov/5614/Regional-Profiles

- ◼ **City of Mesa**
- ◼ **City of Buckeye**
- ◼ **City of Cave Creek**
- ◼ **City of Chandler**
- ◻ **City of Gilbert**
- ◼ **City of Glendale**
- ◻ **City of Goodyear**
- ◼ **City of Peoria**
- ◼ **City of Phoenix**
- ◻ **City of Scottsdale**
- ◻ **City of Surprise**
- ◼ **City of Tempe**
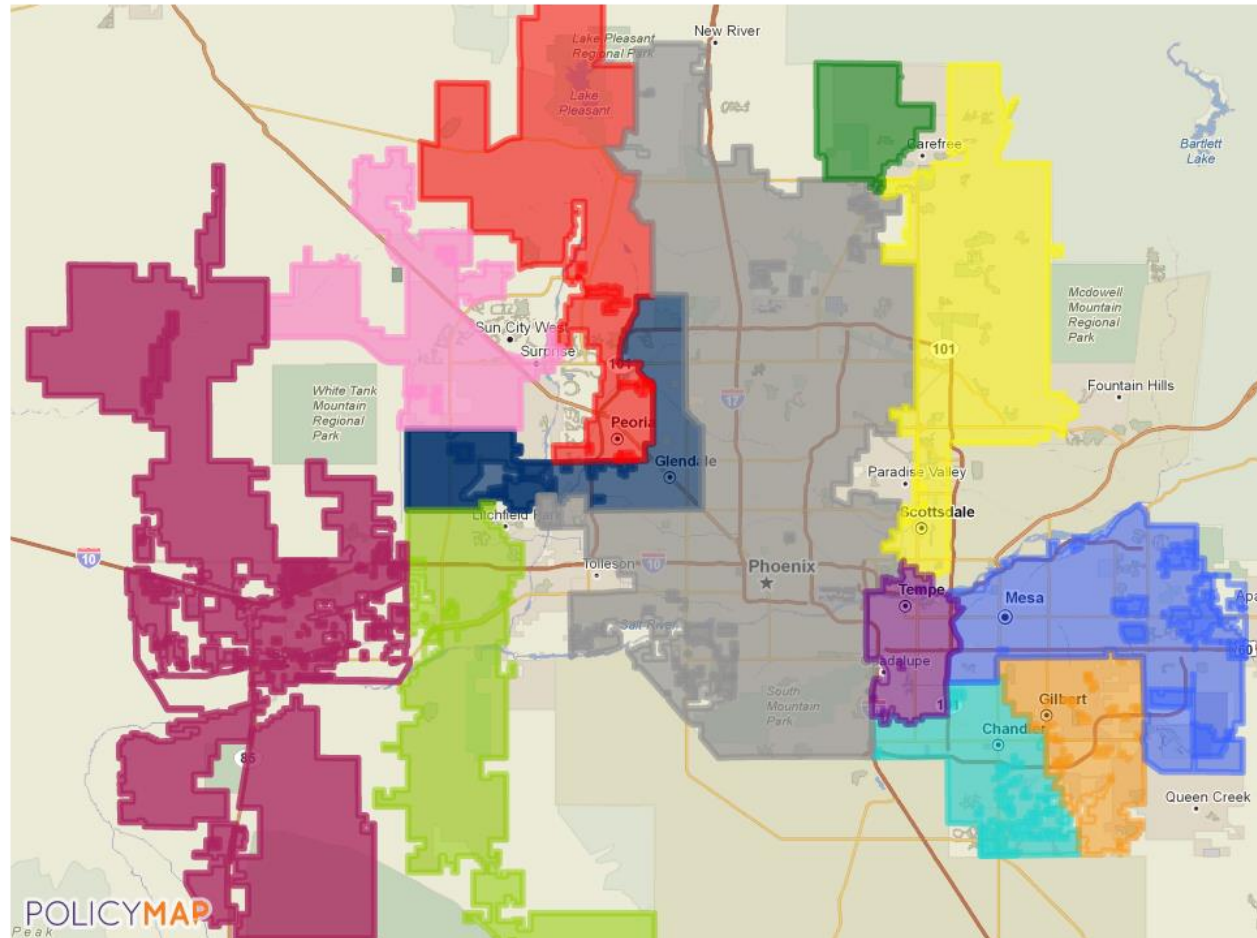
Appendix C: Maricopa County COVID-19 Impact Community Health Needs Assessment Survey

The purpose of this brief survey is to get your opinion about COVID-19's impact on community health and quality of life in Maricopa County since March of 2020. Information collected in this survey will be kept confidential and used only in combination with others participating in the survey. No personal identifying information will be collected. Your feedback will be used to help guide future community health improvement planning and funding efforts. This survey should take about 15 minutes. If you have questions about the survey or need it provided in an alternative language or format, please email Tiffany.Tu@maricopa.gov and we will do our best to accommodate.

The following information is used for demographic purposes and does NOT identify you; all responses are confidential. To learn more about why CHNAs are important, please visit https://www.cdc.gov/publichealthgateway/cha/plan.html.

1. **What is the ZIP code that you currently reside in?** _____

2. **What is your gender?**

☐ Female	☐ Male	☐ Transgender	☐ Prefer to self-describe _____	☐ Prefer not to answer

3. **What is your age range?**

☐ 12-17	☐ 18-24	☐ 25-34	☐ 35-44
☐ 45-54	☐ 55-64	☐ 65-74	☐ 75+

4. **Which racial and/or ethnic group do you identify with? (Check no more than two)**

☐ African American/Black	☐ American Indian/Native American	☐ Asian	☐ Hispanic/Latinx
☐ Native Hawaiian or other Pacific Islander	☐ Caucasian/White	☐ Other: _____	☐ Prefer not to answer

5. Which group(s) do you most identify with? (check all that apply)

☐ Adult with children under age 18 or living in the same home	☐ Single parent	☐ LGBTQI	☐ Person experiencing homelessness
☐ Person living with a disability	☐ Immigrant	☐ Refugee	☐ Veteran
☐ Person living with HIV/AIDS	☐ Other: _____	☐ Prefer not to answer	☐ None

6. What range is your household income?

☐ Less than $20,000	☐ $20,000 - $29,000	☐ $30,000 - $49,000
☐ 50,000 - $74,000	☐ $75,000 - $99,999	☐ Over $100,000
☐ Prefer not to answer		

7. What is the highest level of education you have completed?

☐ Less than a high school graduate	☐ High school diploma or GED	☐ Some College or Associate degree (2yr)	☐ Graduate of vocational/trade school
☐ Currently enrolled in college	☐ Bachelor's Degree (4yr)	☐ Postgraduate Degree	☐ Other: _____
☐ Prefer not to answer			

In this survey, "community" is defined as the areas where you work, live, learn, and/or play.

8. Since March of 2020 (the start of the COVID-19 pandemic), how would you rate your physical health?

Excellent	Very Good	Good	Fair	Poor

9. Would you rate your current physical health as Better, Similar, or Worse compared to your physical health prior to March of 2020?

Better	Similar	Worse

10. Since March of 2020 (the start of the COVID-19 pandemic), how would you rate your mental health, including your mood, stress level, and your ability to think?

Excellent	Very Good	Good	Fair	Poor

11. Would you rate your current mental health as Better, Similar, or Worse compared to your mental health prior to March 2020?

Better	Similar	Worse

12. Since March of 2020 (the start of the COVID-19 pandemic), if you sought services to address your mental health, including your mood, stress level and/or your ability to think, how often have you been able to get the services you need?

Always	Sometimes	Never	Not Applicable

13. What services would have improved overall mental and physical health of your family in the last year? (check all that apply).

☐ Childcare services	☐ In-person school	☐ Technology and internet service	☐ Assistance with finding employment
☐ Assistance with paying utilities	☐ Assistance with paying rent	☐ Assistance with finding healthcare	☐ Assistance with finding substance use treatment
☐ Assistance with mental health issues	☐ Assistance with finding COVID-19 vaccine	☐ Other: _____	

14. Since March of 2020, have you had enough money to pay for essentials such as:

Food	Always	Sometimes	Never	N/A
Housing: Rent/Mortgage	Always	Sometimes	Never	N/A
Utilities	Always	Sometimes	Never	N/A
Car/Transportation	Always	Sometimes	Never	N/A
Insurance	Always	Sometimes	Never	N/A
Clothing/Hygiene Products	Always	Sometimes	Never	N/A
Medication/Treatments	Always	Sometimes	Never	N/A
Childcare	Always	Sometimes	Never	N/A

Tuition or Student Loans	Always	Sometimes	Never	N/A

15. Since March of 2020, have you applied for any of the following financial assistance due to the impact of the COVID-19 pandemic to assist with the essential cost of living expenses listed above?

COVID-19 Relief Funding for You/Family	Yes	No
COVID-19 Relief Funding for your business	Yes	No
Unemployment due to loss of job (laid off)	Yes	No
Unemployment due to staying home to care for children, elderly parents, or ill family members	Yes	No
Unemployment due to COVID-19 illness (self)	Yes	No
WIC (Women, Infant, and Children)	Yes	No
SNAP Food Stamps	Yes	No
Medicaid Insurance	Yes	No

16. Since March of 2020, how often did you seek financial assistance to help pay for healthcare expenses (e.g., doctor bills, medications, medical treatments, doctor co-pay, etc.)

Always	Sometimes	Never

17. If you received a stimulus check in the fall of 2020 and spring of 2021, what impact did this have on alleviating your essential living expenses and access to healthcare?

Strong Impact	Moderate Impact	Weak Impact	No Impact/No difference	Did Not Receive

18. Since March of 2020, was your employment impacted due to the COVID 19 pandemic? (check all that apply)

☐ No, continued working the same number of hours	☐ No, required to continue working onsite	☐ Yes, work hours were reduced	☐ Yes, required to telework

☐ Yes, furloughed (temporary job loss, able to return to work once management contacts you)	☐ Yes, laid off	☐ Yes, quit to care for children due to school closure	☐ Yes, quit to care for ill family members
☐ Yes, quit due to COVID-19 illness (self)	☐ Yes, unable to return to work due to COVID-19 illness (long-term effects)	☐ Yes, started a new job	☐ Other: _____

19. Since March of 2020, how do you currently pay for your healthcare including medications, dental, and health treatments? (check all that apply)

☐ Health insurance purchased on my own or by family member	☐ Health insurance provided through employer	☐ Indian Health Services	☐ Medicaid/AHCCCS
☐ Medicare	☐ Use free clinics	☐ Use my own money (out of pocket)	☐ Veterans' administration
☐ Did not seek healthcare since March of 2020	☐ Other: _____		

20. Since March of 2020, what have been the primary barriers to seeking or accessing healthcare in your community? (check all that apply)

☐ Lack of childcare	☐ Difficulty finding the right provider for my care	☐ Fear of exposure of COVID-19 in a healthcare setting	☐ Unsure if healthcare need is a priority during this time
☐ Distance to provider	☐ Inconvenient office hours	☐ No health insurance coverage	☐ Not enough health insurance coverage
☐ Transportation to appointments	☐ Understanding of language, culture, or sexual orientation differences	☐ I have not experienced any barriers	☐ Other: _____

21. Since March of 2020, what have been the greatest strengths of your community? (check all that apply)

☐ Ability to communicate with city/town leadership and feel that my voice is heard	☐ Accepting of diverse residents and cultures	☐ Access to schools or school alternatives	☐ Access to affordable childcare
☐ Access to affordable healthy foods	☐ Access to COVID-19 testing events	☐ Access to cultural & educational events	☐ Access to medical care
☐ Access to affordable housing	☐ Access to COVID-19 vaccine events	☐ Access to quality online school options	☐ Access to mental health services
☐ Access to community programming such as classes & trainings	☐ Access to Flu vaccine events	☐ Access to jobs & healthy economy	☐ Access to parks and recreation sites
☐ Access to public libraries and community centers	☐ Access to safe walking and biking routes	☐ Access to substance abuse treatment services	☐ Access to low crime / safe neighborhoods
☐ Access to public transportation	☐ Access to services for seniors	☐ Access to support networks such as neighbors, friends, and family	☐ Access to religious or spiritual events
☐ Access to social services for residents in need or crisis	☐ Access to clean environments and streets	☐ Other: _____	

22. Since March of 2020, in addition to COVID-19, which health conditions have had the greatest impact on your community's overall health and wellness? (check all that apply)

☐ Alcohol/Substance abuse	☐ Cancers	☐ Dementia/Alzheimer's	☐ Diabetes
☐ Heart disease and stroke	☐ High blood pressure or cholesterol	☐ HIV/AIDS	☐ Lung disease (asthma, COPD, emphysema)
☐ Vaccine preventable disease such as flu, measles, and pertussis (whooping cough)	☐ Mental health issues (depression, anxiety, bipolar, etc.)	☐ Overweight/ obesity	☐ Sexually transmitted disease

☐ Tobacco use including vaping	☐ Other: _____		

23. Since March of 2020, which of the following issues have had the greatest impact on your community's health and wellness? (check all that apply)

☐ Child abuse/elder abuse & neglect	☐ Distracted driving (such as cell phone use, texting while driving)	☐ Domestic violence / sexual assault	☐ Gang-related violence
☐ Gun-related injuries	☐ Limited/lack of access to COVID19 testing	☐ Lack of affordable healthy food options	☐ Lack of people immunized to prevent disease
☐ Homelessness	☐ Limited access to healthcare	☐ Lack of affordable housing	☐ Lack of public transportation
☐ Drug/substance abuse (illegal & prescribed)	☐ Limited access to mental/behavioral health services	☐ Lack of jobs	☐ Lack of quality and affordable childcare
☐ Lack of COVID-19 vaccine access	☐ Limited access to educational and supportive programing for children and adolescents	☐ Lack of alternative educational opportunities	☐ Lack of safe spaces to exercise and be physically active
☐ Lack of support networks such as neighbors, friends, and family	☐ Motor vehicle & motorcycle crash injuries	☐ Racism/ discrimination	☐ Suicide
☐ Teen Pregnancy	☐ Other: _____		

24. Overall, how easy was it to navigate this electronic survey?

☐ Very easy to use	☐ Easy to use	☐ Neither easy nor difficult to use	☐ Difficult to use	☐ Very difficult to use

25. Based on the given survey questions above, the information provided was easy to understand.

☐ Strongly agree	☐ Agree	☐ Neutral	☐ Disagree	☐ Strongly disagree

26. What else would you like to share with us regarding your experience with COVID-19 that we didn't ask?

27. Want to tell us more? We want to share community members' stories. Let us know you're interested by indicating your type of experience along with sharing your email address/phone so we can contact you.

- ☐ **I experienced COVID-19. _____**
- ☐ **A loved one experienced COVID-19. _____**
- ☐ **My work was impacted by COVID-19. _____**
- ☐ **Other: _____**

Thank you for completing MCDPH's COVID-19 Impact Community Health Assessment Survey.

Appendix E: Social Media Graphics

References

1) Canadian Mental Health Association. Connection between mental and physical health. https://ontario.cmha.ca/documents/connection-between-mental-and-physical-health/. Published 2021. Accessed May 28, 2021.
2) Healthy People 2020. Access to health services. https://www.healthypeople.gov/2020/topics-objectives/topic/social-determinants-health/interventions-resources/access-to-health. Updated May 27, 2021. Accessed May 28, 2021.
3) National Conference of State Legislatures. COVID-19: Impact on employment and labor. https://www.ncsl.org/research/labor-and-employment/covid-19-impact-on-employment-and-labor.aspx. Published May 13, 2020. Accessed May 28, 2021.
4) Guardian. How COVID-10 could affect the future of work. https://www.guardianlife.com/coronavirus/covid19-and-the-future-of-work. Published 2020. Accessed May 28, 2021.
5) Rural Health Information Hub. Defining the social determinants of health. https://www.ruralhealthinfo.org/toolkits/sdoh/1/definition. Published 2021. Accessed May 28, 2021.
6) Geisen E, Bergstrom JR. Usability testing for survey research. https://www.uxmatters.com/mt/archives/2017/10/usability-testing-for-survey-research.php#:~:text=Usability%20testing%20allows%20an%20in,on%20a%20smartphone's%20small%20screen. Published October 9, 2017. Accessed May 28, 2021.
7) Faggiano A, Carugo S. Can the implementation of electronic surveys with quick response (QR) codes be useful in the COVID-19 era? *International Journal of Epidemiology*. 2020; 49(5). doi: 10.1093/ije/dyaa170
8) Hillmer B. Translate your survey into different languages. https://help.alchemer.com/help/create-a-translated-survey. Updated January 5, 2021. Accessed May 28, 2021.

Maricopa County Public Health
WeArePublicHealth.org